Rising from the Waste

- Organising Wastepickers in India, Thailand and the Philippines

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Committee for Asian Women

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About CAW

Committee for Asian Women (CAW) is a regional network of 46 women workers groups in 14 Asian countries that aims to empower women workers to protect, advocate, and advance their rights. CAW is part of the global movement advocating workers' rights for over 30 years.

CAW's Vision

CAW envisions a world where all people are free to develop their potential without any form of domination and exploitation based on class, gender, colour or religious belief. This is a world where the common wealth is used for the common good, workers enjoy the fruits of their labour, women prevail against patriarchy, and women workers determine their own destinies.

Foreword

Niza Concepcion, Committee for Asian Women

Informal workers do not have formal employment contracts, social protection and benefits, or workers' representation. Traditionally considered as peripheral sector workers, there is very little documentation on the situation of informal workers. Yet their contribution to the economy has saved many countries in chronic economic fall-out from total collapse.

In 2006 members of the Committee for Asian Women (CAW) attending a general consultation stressed the importance of collecting and disseminating information about informal workers, such as alternative organising strategies, policy reform, and legislative efforts. The consultation identified as of particular concern, the plight of working women in the informal economy who are not organised into unions, and therefore have no legal means to demand for their rights.

CAW initiated a research in 2008 to respond to these needs. A three-part research on the Informal Economy focused on domestic workers, waste collectors and agricultural workers. The main researchers were support groups of domestic workers, waste collectors and agricultural workers themselves. In addition to building public awareness about the situation of informal workers, the research aims to assist in organising and mobilising of informal women workers towards gaining recognition and protection of their rights as workers. CAW believes an empowered women workers movement can catalyse genuine progress in the lives of informal women workers and the lives of workers in general.

"Legislation is an important instrument to address the all-important issue of recognition and protection for workers and employers in the informal economy. All workers, irrespective of employment status and place of work, should be able to enjoy, exercise and defend their rights as provided for in the ILO Declaration on Fundamental Principles and Rights at Work and its Follow-up and the Core Labour Standards. To ensure that labour legislation affords appropriate protection for all workers, governments should be encouraged to review how employment relationships have been evolving and to identify and adequately protect all workers."—ILO Resolution concerning decent work and the Informal Economy

Table of C	contents
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 1 Introduction to the informal sector 1.1 Methodology 1.2 Structure of solid waste management in Asia 1.2.1 Structure of the waste recycling sector in Asia 1.2.2 Types of waste collectors 1.2.3 Categories of Scrap Traders 1.2.4 Reprocessing 	1 2 2 2 3 7 10
2 Current situation of waste pickers in India, Thailand and the Philippines 2.1 Critical Issues: Key problems of waste pickers 2.1.1 Hazardous conditions of work affecting health and safety 2.1.2 Lack of recognition, labour rights and social protection 2.1.3 Policy Advocacy and Responses 2.1.4 Exclusive urban renewal policies and solid waste management systems	11 15 15 18 19 24
2.1.5 The economic contribution of waste pickers 2.1.6 Making the working poor visible 2.2 Profile of waste pickers 2.2.1 India 2.2.2 Thailand 2.2.3 Philippines 2.3 Conditions of work 2.3.1 India 2.3.2 Thailand	27 28 28 28 31 32 32 32 33
3 Status of Organisation and Integration (case studies of organising	35
experiences) 3.1 India: Case studies of integration experiences 3.1.1 Integration efforts by Aakar, Mumbai 3.1.2 Integration efforts by Forum of Recyclers Communities and Environment (FORCE), Mumbai 3.1.3 Efforts at integration Stree Mukti Sanghatna/ Parisar Bhagini Vikas, Mumbai 3.1.4 Kagad Kach Patra Kashtakari Panchayat-SWaCH,	37 40 42 44
Pune 40 Strategy: 3.1.5 Chintan Environmental and Research Group, Delhi 3.2 Thailand 3.3 Philippines	52 54 56

4 Legal Provisions4.1 India4.1.1 The Constitution of India and Central Legislations	61 62 62
4.1.2 State Legislation4.1.3 Municipal Laws4.2 Thailand4.3 Philippines	65 66 67 67
4.3.1 Philippines Republic Act 9003: Year 2000, Approved in January 2001	68
5 Sustainability of Integration Of The Informal Sector In Solid Waste Management	71
5.1 From the pages of history5.2 Enabling conditions for integrating the waste informal ector5.3 Legal framework5.4 Civil society and Public opinion	72 74 76 76
 6 Conclusion And Recommendations 6.1 Conclusion 6.2. Recommendations 6.2.1 Recommendations for organisations of waste pickers and 	78 78 78 78
traders 6.2.2 Recommendations for Municipal, State and National Governments	79
6.2.3 Recommendations for donor agencies and grant making bodies	80
6.2.4 Recommendations for waste generating corporate and business houses and industries	81
6.2.5 Recommendations for civil society organisations and citizens	81
Annexure Annexure I: Concept Note for Research on Waste Collectors Annexure II: Relevant Extracts from Government Orders and Laws in India	82 82 83
Annexure III: Profiles of organisations of waste pickers or working with waste pickers	93
Bibliography	97
About the authors	101

Acknowledgements

It was at a conference titled *Impact of Globalisation: Uniting Women Workers of Asia in Action* that the Committee for Asian Women (CAW) decided to focus on women workers outside the traditional labour force. Workers in the informal economy are usually unrecognised and unorganised and lack the legal means to realise their rights as workers. CAW saw documentation of the conditions of such workers as the first step towards providing the basis for organising, tools for advocacy and establishing linkages with the formal economy. This report documents the status of waste pickers in India, Thailand and the Philippines and organising efforts where applicable.

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Waste pickers in India, Thailand, the Philippines: an overview

1 Introduction to the informal sector

There are different conceptions of the informal sector and an operational definition is what seems to be the most effective in delineating what constitutes the informal sector. It is difficult to demarcate clear boundaries, given that the intersection between the formal and the informal is intertwined and complex. The informal and the formal are not two distinctive isolated categories standing next to one another. Rather, in reality there is a range of illegal formal arrangements as well as legal informal arrangements. Formal industry often farms out work to home based workers in the informal economy. The complexities of these arrangements are sometimes guite difficult to unravel. This is particularly true of the waste recycling sector that comprises collectors, traders and recycling enterprises. The informality of the arrangements sometimes results in precarious social and economic relationships that are vulnerable to changes in the external environment. In Delhi for example, waste generators used to deposit their waste in the containers owned by the city government that were placed on the street and afforded easy access to recyclables for waste pickers. The question of ownership of waste was in the arev area of the undetermined and the undefined and therefore uncontested. Waste collection in Delhi has been privatised and ever since the contracted companies have been circumscribing waste pickers' access to the recyclables.

Nonetheless, the informal sector (in waste as in others) demonstrates a high degree of ability to respond to threats as challenges and the flexibility to adapt creatively to changes. It distinguishes itself by its creativity, an impressive potential for improvisation and for innovation. Having said this, it also needs be emphasised that traditionally, governments tend to neglect the informal sector and indeed even to discriminate against it. Consequently, the sector is characterised by the relatively high presence of socially or economically or socially marginalised workers, low earnings or wages, lack of access to formal institutional credit, lack of social status and dignity and overt or covert forms of discrimination.

For the purposes of this study we shall be using the ILO framework outlined below, for limiting the definition of the informal sector.

• Ease of entry on account of low entry barriers

- Utilisation of domestic/local resources
- Preponderance of small size enterprises
- Labour intensive and adapted technologies
- Trade/industry learning takes place outside formal educational institutional structures
- Utilisation of unregulated and competitive markets

In many parts of the developing world collecting and sorting waste "informally" provides a livelihood for large numbers of the urban poor- men and women, with women (and their children) often predominating. The World Bank estimates that 1% of the urban population in developing countries earns a living through scavenging or waste collection and recycling.

1.1 Methodology

Waste pickers tend to be invisible and therefore even less organised that those in other informal occupations such as street vending and domestic work. There is therefore very little information on workers in this sector and existing studies tend to be location specific. Much of the information that exists has to be culled out from reports of environmental groups and studies on solid waste management that carry references to waste recycling. Papers, documents and reports available on the internet and published works were the source for much of the content of this study. CAW also invited its constituents in Thailand and the Philippines to gather information about this occupational group which was provided in the form of papers.

Methodologically, the study is confined to secondary data, drawing its findings from existing studies, papers, government reports and other documents that are woven together to present and overview of the situation of waste pickers in Asia. The scope of the study is limited to India, Thailand and the Philippines and within these countries to a few cities where some data exists on account of previous studies. This report is therefore indicative rather than definitive and provides an overview rather than a detailed exposition.

1.2 Structure of solid waste management in Asia

1.2.1 Structure of the waste recycling sector in Asia

The pyramidal structure of the waste recycling sector is mirrored in the countries that are part of this study, barring some contextual differences in detail. The collector segment consists of waste pickers and itinerant waste

buyers. The trader segment consists of retailers, stockists and wholesalers as they are referred to in India or junkshop owners, consolidators and processors as they are referred to in the Philippines. Essentially the trade is structured in a manner that allows for progressive consolidation.

The recycling sector in Pune is structured in the form of a pyramid, with the waste-pickers/scrap collectors at the base and the reprocessors perched at the apex. The waste-pickers engage in the "free" collection of scrap from municipal garbage bins and dumps. Marginally above them are the itinerant buyers who purchase small quantities of scrap from households. In Delhi, a group referred to as "thiawalas" also work out of a fixed. open space where they sit and carry out their sale purchase operations. Between the scrap collectors and the reprocessors are various levels of traders including retailers, stockists and wholesalers. In India these traders are usually registered under the Shops and Establishments Act1. The diagram alongside pertains to Pune but is illustrative of the recycling structure in other Asian countries as well.



Itinerant Waste Buyer in the Philippines

Within the scrap trade establishments are various categories of workers such as those who do sorting, grading and baling; loading-unloading and cleaning operations.

1.2.2 Types of waste collectors

Scrap collection is the first stage in the recycling sector. In Asia, it is undertaken by two broad categories of workers, waste-pickers and itinerant buyers. Waste-pickers retrieve paper, plastic, metal and glass scrap from garbage bins or receptacles that are provided by the municipalities for the disposal of garbage on the street, and from landfill sites where the collected garbage is transported

¹ The Shops and Establishment Act is a state legislation act and each state has framed its own rules for the Act. The object of this Act is to provide statutory obligation and rights to employees and employers in the unauthorized sector of employment, i.e., shops and establishments. This Act is applicable to all persons employed in an establishment with or without wages, except the members of the employers' family.

and dumped. Itinerant waste buyers purchase small quantities of scrap from households, offices, shops and other small commercial establishments.

Waste pickers can be categorised by what they collect, how they collect it and where they collect it from. Their earnings and conditions of work are circumscribed by the mode of collection. Since waste pickers are numerically the biggest category among collectors, henceforth in this study waste pickers will be the term used whenever there is generic reference to collectors.

Broadly waste pickers in Asia can be classified into the following categories:

1. Itinerant Waste Buyers (IWB) -

Generally men moving around with push carts and bicycles to buy small quantities of recyclable waste from households and small commercial establishments. In some cities, collectors would specialise in certain commodities. While in Pune the lines between the IWBs and the waste pickers are clearly drawn, in Metro Manila it is not unknown for IWBs to source their commodities from the household garbage bins placed for clearance outside the homes.







Itinerant waste buyer in Thailand

In Pune for example²,

Men outnumber women in this segment and are differentiated by the tools of their trade. The men use weighing scales for the purchase; push carts to transport the waste and have greater access to capital and often specialise in the kinds of scrap they buy. The women carry baskets on their heads and do not trade on the basis of weights and measures. The proportion of women is in fact on the decline and fresh entry into this segment is almost non existent.

² Chikarmane,P, Deshpande.M, and Narayan.L, Report of Scrap Collectors, Scrap Traders and Recycling Enterprises in Pune, ILO, 2001

Most itinerant waste buyers from the Taljai settlement in Pune specialise in corrugated cartons. Itinerant waste buyers are positioned to get at the choice waste, uncontaminated by organic waste since they buy the scrap from the generators usually by weight as in the case of newspaper and corrugated board or by number as in the case of empty alcohol bottles.

In Manila,

The itinerant waste buyers and specialised waste collectors are referred to as *Bote, Dyario, Bakal (Bottle, Newspaper, Iron) collector.* They roam the streets buying old newspapers, empty bottles, tin cans, old clothes and rags. The domestic workers or householders usually separate the materials of relatively high quality and sell it to the IWB.

2. Informal refuse collectors

In Pune, Mumbai and Delhi,

Waste pickers and itinerant waste buyers who have been integrated into door to door collection of waste. They get a collection fee as well as the income from the sale of recyclables

In Manila,

In many urban communities, local entrepreneurs provide waste collection for a fee by setting up junkshops. In many Philippine cities, informal refuse collectors using pushcarts, carts attached to a bicycle and even motorised tricycles serve to retrieve the recyclables contained in the garbage.

Recyclable wastes³ are being recovered through itinerant buyers and junk shops. Municipalities such as Agoo, Bauang, San Fernando and Bacnotan have medium to large junkshops. Further recovery takes place in the disposal facility such as those seen by the ISWM study team in Agoo and in the garbage truck in the case of Santol. Waste picking is done by participants in the municipal and city disposal facilities. They are authorised to do waste picking by the local government.

Monthly gross income of waste pickers in Agoo and Bacnotan ranged from PHP 200 to PHP500 while those from San Fernando City earned PHP5,000 to PHP4,500 a month. They sell the recovered materials to local junkshops while some sell their recyclables in Baguio City. Wastepickers do not have medical benefits. They provide for their own waste picking equipment and supplies. There are no facilities such as toilets and washing area in their work

³ Report on the Key Informant Interviews and Focused Group Discussions Conducted as Part of the Integrated Sustainable Waste Management (ISWM) Assessment Project, WASTE-Centre for Advanced Philippine Studies, 2007

area except for the San Fernando City Landfill. Although allowed to recover wastes in the disposal facilities, they have no security of tenure.

3. Waste Pickers (WP) -moving around foot on the streets and at garbage bins to retrieve and collect paper, plastic, metal, glass and other recyclable from household or commercial garbage. In Asia the proportion of women is significant but for example in Delhi the proportion of men is significantly higher.

In Manila,

A growing number of homeless people find themselves scavenging from trash around the metropolis. The homeless find collecting recyclable plastics and cans, and selling them in junkshops around the city, make small remedies against the pangs of hunger.

In Pune,

Various sub categories of waste pickers exist or are created as a consequence of the changes in solid waste management practices. In Pune, India for example there are a category of waste pickers who move around with magnets in industrial areas looking to collect ferrous metal dust and filings that spill along the roads when material is transported.

Waste pickers at open and controlled dumps and landfill sites salvage recyclable materials under extremely hazardous conditions. Often whole families are involved, including many women and in many cases children.

In Manila.

Scavengers are found in particular areas specifically in both Open Dumping (OD) and Controlled⁴ Dumping (CD) sites where they eke their meagre income by collecting recyclable items directly from the dump sites and selling these materials to the nearest junkshops usually located at the foot of the garbage dump.

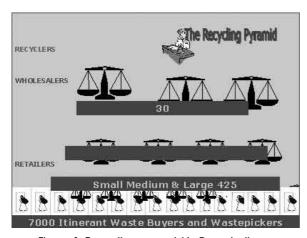
"We pick garbage, sort it, pack it and sell it for a living", Sepang retorted, poking on the newly-dumped trash by an eight-wheeler truck with hookended metal rod. "Garbage is gold to the people here," Elma Macasantos of the Department of Social Welfare and Development (DSWD), said referring to the Payatas dumpsite. In May 11, 2000, some 97 people died and 157 others were lost when a flashflood and fire wrecked havoc on the makeshift tents and shanties. After the tragedy, the scavengers have since

⁴ Bengwayan, M. Scavenging for gold that does not glitter, Manila, Brunei Times, 12.8.2008

returned. "About 65,000 people live here and depend on trash for a living," Macasantos added.

Wage employees, municipal or contracted workers of the municipalities cannot be called waste pickers although they also retrieve recyclables from the garbage they collect in cities where garbage collection trucks move from block to block collecting garbage. For example, in Quezon city⁵ in the Philippines, the *paleros* or the garbage crew in the contracted vehicles separate the saleable materials during the collection route. Alternatively such workers permit access to waste pickers at a price. In parts of certain cities like Nasik, Surat, Mumbai, Nagpur in India and Manila and Bangkok this system has displaced waste pickers or relegated them to dumpsite collection. Squabbles between the waste pickers and the collection crew are also fairly common.

1.2.3 Categories of Scrap Traders



The retail traders form the cutting edge level of the scrap trade. Most often they are located in slums with significant populations of scrap collectors. They have a direct relationship with the scrap collectors from whom they purchase scrap. Stocking and segregation is the first level of wholesale trade.

Figure 1: Recycling pyramid in Pune, India

Stockists are always also retail traders. Then there are the wholesale traders who specialise in certain commodities. Trade in commodities such as grain, agricultural produce, cotton and textiles, steel and non-ferrous metals, hardware and timber/wood is well established and markets exist for all these commodities. This is not so in the case of scrap.⁶ Trade in scrap is relatively invisible and unrecognised.

⁵ Economic aspects of the informal sector in solid waste management in Quezon city, SWAPP-GTZ, 2006

⁶ Maharashtra: State in Western India

In Pune, there are no geographical areas designated as scrap markets. The traders are not part of associations like the Pune Merchants Chamber or the Mahratta Chamber of Commerce, Industries and Agriculture. The scrap trade is generally believed to have a very low status within the hierarchy of commodity trading, regardless of the profit potential. It has no respectability. One of the reasons is that scrap is collected from garbage and therefore considered 'dirty'. The retail trade involves daily interaction with people who are looked upon as 'low-caste, uncouth, foul mouthed, the scum of society'. Nonetheless, the trade operates with the active support and patronage of the political class.

In Delhi and Mumbai however, the picture is different. Mumbai and Delhi are major trading centres for many commodities including waste. Central Mumbai is locus of major recycling activities. The presence of a waste mafia in Mumbai is also alluded to. Mumbai is India's largest metropolis. Its financial prosperity fuelled by flourishing markets and booming businesses makes it fertile ground for criminal activity in every sector including waste collection and recycling. According to municipal sources, till the early 2000s, Delhi was the biggest plastic recycling hub in Asia. In the West of the city lies the biggest ferrous metal market. The North West includes the big plastic markets. Eastern Delhi is the electronic waste area. Central Delhi is the hub for old paper. The glass and paper traders have made associations that represent their interests. Unfortunately, they have not been able to garner official support at the highest levels for their work, but they have been able to find support amongst the lower level politicians. Some of them have been able to garner support with significant results.

Nine (9) cities and one municipality in the Philippines were surveyed for the study⁸ to have a better understanding of the recycling market in Mindanao. A total of 229 junkshops, 22 consolidators and 13 processors were identified from the survey areas. Table 5 shows that Davao City has the most number of junkshops, consolidators and processors, followed by Gen. Santos City with a total of 61 junkshops and two (2) consolidators, and Zamboanga City with 23 junkshops and four (4) consolidators. Kidapawan City has the fewest number of junkshops with only five (5). No consolidators and processors were identified in Ipil, Isabela City, and Pagadian City. One plastic consolidator was identified in Tacurong City.

The big junkshops are located in San Fernando City, Bacnotan and Agoo in the Philippines⁹. The bigger junkshops employ as much as 14-13 workers while

⁷ Chaturvedi, B. In Khushwant Singh (ed) City Improbable: An Anthology of Writings on Delhi. The Kingdom of Waste. Viking, Penguin India. 2001 and Chintan Environmental Research and Action Group. Space for Waste 2003. Delhi B. LGU Revenues and Access to Financing Sector: The Market for Recyclable Solid Waste Materials in Mindanao Report prepared for the Philippines Environmental Governance Project 2 (DENR-USAID) February 2006

⁹ Report on the Key Informant Interviews and Focused Group Discussions Conducted as Part of the Integrated Sustainable Waste Management (ISWM) Assessment Project, WASTE-Centre for Advanced Philippine Studies, 2007

the small junkshops may have one (1) or two (2) workers. The biggest junkshop owner stated that he generates an annual gross income of P1 million. The other participants did not disclose their gross income. The bigger junkshops also have wider buying area beyond their municipalities to neighbouring municipalities in La Union and even as far as neighboring llocos Sur Province. They sell their recyclables to consolidators some of whom send their trucks to pick up the materials.

Table 5. Number of junkshops, consolidators and processors in ten(10) urban centers in Mindango.

City	No. of Junkshops			No. of Consolidators			No. of Processors/ Re-Users		
	Identified	Surveyed	Percent Surveyed	Identified	Surveyed	Percent Surveyed	Identified	Surveyed	Percent Surveyed
Cotabato City	17	10	58.82	2	1	50.00	0	0	0
Davao City	84	6	7.14	11	11	100	12	9	75.00
General Santos City	61	10	16.39	2	2	100	0	0	0
lpil (Municipality)	8	8	100	0	0	0	0	0	0
Isabela	8	5	62.5	0	0	0	0	0	0
Kidapawan	5	5	100	2	2	100	0	0	0
Koronadal	7	7	100	1	1	100	0	0	0
Pagadian	8	7	87.5	0	0	0	0	0	0
Tacurong	8	8	100	0	0	0	1	1	100
Zamboanga	23	4	17.39	4	4	100	0	0	0
Total	229	70	30.57*	22	20	90.91*	13	10	79.92*

^{*} Average percentage of surveyed provinces in the region of Mindanao

Some of the big junkshops have their own trucks which bring the recyclables to consolidators or recyclers in Baguio City, Pangasinan, Pampanga and Bulacan. Junkshops are merely required to secure business permits and are not required to report how much waste materials they recover. There are no specific environmental conditionalities aside from the ones required from other businesses – such as the provision of sanitary toilets and washing area. Operational issues cited include cases of disregard for the anti-fencing law, unsafe dismantling of electronic wastes, unsightliness of facilities, and lack of personal protective equipment for workers. Only San Fernando City has an ordinance regulating junkshops.

There are several cities that appear to be centers of recyclable trading. In western Mindanao, the town of Ipil appears to be the center for recyclable

trading for Sibugay province. Isabela receives recyclables from neighboring islands and municipalities of Basilan. Zamboanga del Sur municipalities bring their materials to Pagadian City, which are then transported to other destinations – like Zamboanga City, Davao City, Ozamis, and Cagayan de Oro. Zamboanga City, however, appears to be the center of recyclables trading for Western Mindanao and receives materials from Sulu, Bongao, Basilan province (including Isabela City), Ipil, Pagadian, and surrounding municipalities.

The results from the 70 junkshops interviewed show that not all recyclables are traded in the study sites. Glass containers, specific types of plastics, metals, papers and wet lead acid batteries are the major types of recyclables bought and sold by junkshops and consolidators in the sites. There are no reported recyclers' association that affected the operation of junkshops and consolidators. The pricing of materials, in general, is found to be competitive and no institutional barriers hinder the exit or entry into the recycling market.

Junkshops are also often regarded negatively because the foul smell of waste materials affect neighbouring settlements. Secondly, in the absence of enforcement of sanitation and building standards, junkshops appear "dirty" endangering the health of surrounding communities, as well as the aesthetics of the place.

1.2.4 Reprocessing¹⁰

Processing and reprocessing industries that source scrap are usually in both the informal and the formal economy. Plastics, electronic waste, are typically in the informal sector while paper, cardboard, metals and glass are in the formal sector. A wide variety of enterprises utilise scrap commodities as raw material. In terms of size the range extends from small, registered enterprises in the case of plastic bags to medium size labour intensive small-scale industries for road scrap (waste paper) to the large modern automated multinational factories in the case of paper and glass. Many are located in industrial areas though not necessarily in industrial estates. All the enterprises utilise power, the most common form of power being electricity. Their capital investment varies from a few hundred €uros to several hundred thousand €uros. Production processes in the enterprises are automated to varying degrees. Manual processes are relatively higher in the processing of all kinds of plastic scrap whereas there is a high degree of automation in the processing of other commodities.

¹⁰ Chikarmane, P, Deshpande, M, and Narayan, L, Report of Scrap Collectors, Scrap Traders and Recycling Enterprises in Pune, ILO, 2001

Conclusion

In this chapter we have examined the dimensions of the informal sector in general as well as with specific reference to the informal sector in waste. For the purposes of this study, the term "informal" refers to those who generally make a living from solid waste but are not formally in charge of providing the service i.e. having contracts with a municipality or being paid by it. Therefore, normally a cooperative working under a contract with the municipality should not be regarded as "informal" whereas a co-operative working without recognition of the official system is part of the informal sector. However, within this study and due to the fact that in the past various informal groups were transformed in formal ones, these groups (cooperatives or enterprises of various kinds) have been covered within the study.

2 Current situation of waste pickers in India, Thailand and the Philippines

Sifting for a living on trash mountain¹¹

Some people in her distant village look down on Teresa Janoras, who traveled to Manila 30 years ago to find a better life and has earned her living digging through garbage ever since. "They say it's smelly," said Janoras, who is now 46 and supports a family of five as a scavenger. "They say we've come all the way here to Manila just to work in the garbage." But garbage has been good to her, she said in her little house, adorned with mismatched curtains she pulled from the refuse. "Think about it," she said. "We don't have bosses. We live a free life. For me, if I don't feel like going to work, I don't go to work. Here, your only concern is survival, your daily sustenance, and the dump can take care of that."

The city government has a program that helps to resettle scavengers in their home provinces but most return to work here, said the dump administrator, Jameel Jaymalin. "There is no livelihood in the provinces," he said. "They prefer to live in the city. They like the city. "When she works - which in fact is just about every day - Janoras is deep in the garbage for 11 hours, starting at dawn. On her best days she can earn a bit more than \$3. "We spend whatever we have," she said. "If I get lucky one day, we eat well. But sometimes we have to make do with just rice and fish paste."

¹¹ Seth Mydans, International Herald Tribune 18 September 2006

A sparrow-thin woman who has lost most of her teeth, Janoras is one of 150,000 people who scavenge or recycle the 6,700 tons of garbage produced each day in Manila, something of a symbol of the poverty and urban collapse of this gigantic slum of a city. A quarter of all that garbage is simply dumped in fields and fetid rivers and in the polluted bay, according to the Asian Development Bank. The city's 10 dumps are already overflowing but no alternative sites have been found. Janoras's workplace is the most famous of the dumps, Payatas, a 30-meter, or 100-foot, mountain of garbage that collapsed in the monsoon rains six years ago and buried more than 200 squatters in their shacks. The disaster spurred an unusual outburst of civic activity, and Payatas has been transformed into a model of efficiency and order that could set an example for many cleaner job sites in Manila.

The mountain has been graded to a gentler slope and the squatters have been moved outside a bright yellow security fence. Signs at the gates read, "No ID, no entry," and "Children under 14 not allowed." On the road up the hillside more signs warn truck drivers: "Check brakes, drop ahead." Security guards wear bright green T-shirts that say, on the front, "Enforcer" and, on the back, "Environmentally Friendly." Like other scavengers, Janoras wears a large laminated identification card around her neck, and when she arrives at work loudspeakers at the peak of the mountain greet her with the national anthem. From time to time, the loudspeakers play a catchy inspirational tune whose words, here on top of the garbage mountain, thread a line between tragedy and hilarity. "Filipino, you're a Filipino!" the song goes. "Show the world what you can do. The Filipino is unique, don't be afraid, be proud. I'm a Filipino. We're Filipinos." But there is no disguising the fact that this is a garbage dump and that Janoras's work is filthy and degrading.

With the other scavengers she joins the hungry flies that swarm over the spilled guts of the city - in constant motion bending, reaching, turning, tossing, lifting, digging, heaving, bending, reaching, turning as the hot sun climbs into the sky above her and begins to sink again. When it rains, the putrid flavours of the muck can send even lifelong professionals staggering down the sopping mountainside, their hands over their faces, the sludge slopping in over the tops of their rubber boots. "Sometimes the smell gets so strong that I feel like throwing up," Janoras said. In the dry months, trucks painted with the bright slogan "Service at its best" stir up a fine, foul dust, choking the lungs with an aerosol of waste. Dizzy and coughing, the scavengers dance with the wind, turning like weathervanes to keep the noxious powder at their backs. The scavengers and recyclers are the great levelers of society, devouring and

regurgitating the remains of the city, perhaps to see it return again as garbage and cycle through once more.

The process starts with the garbage trucks, a sort of serial intestinal tract, that arrive minutes apart, more than 400 a day, bringing 1,800 tons of garbage to the Payatas dump in 16-hour spans. Computers log them in as they arrive, but as in so many areas of life, those amazing machines cannot match the natural gifts of man. "We know where the trucks come from by the smell," said Jaymalin, the dump administrator. "We've worked here for years. It's an inhalent skill." The bounty of the trucks is sifted and sorted by the scavengers, who pass them on to a cottage industry of scrap shops specialising in copper wire, old newspapers, aluminium cans, plastic, cardboard, bits of machinery, box springs, tires, broken toys - virtually all the components of civilised life.

The queen of recyclers is Imelda Marcos, once the first lady of the Philippines, who now designs jewellery from discarded plastic. "The world has produced enough garbage to be recycled to bring paradise again," she said during a recent interview in her luxury apartment. Janoras specialises in rotten food, mostly from restaurants and hotels, which she stuffs into scavenged plastic sacks and sells to a middleman as feed for pigs. She also keeps an eye out for plastic packing strips, which she brings home, cleans and weaves into baskets for sale. "I used to collect tin cans, bottles, cardboard, the usual stuff," she said. "But the scraps are easier; easier to carry." Her laminated ID card is yellow, the code color for a team affiliated with a junk shop that specialises in plastic bottles and cups, and her first responsibility is to the shop. Anything else the scavengers find belongs to them. "You keep the stuff you specialise in," she said. "There are people who only take clothes, or raffle tickets, or foam for mattresses, or bottles." The scavengers in her team know each other's specialties. When Janoras finds scrap wood, she said, she passes it on to a friend. And when her friend finds plastic strips or sacks of rotting food, she calls Janoras to take them.

At the end of the day, Janoras walks down the mountainside to her little home, a kilometer and a half away, where her unemployed husband, Edgar, and two jobless teenage sons are waiting. Her teenage daughter is still at school. Yes, she said with a laugh, it is normal in the Philippines for a woman to support the men in her family. "You can't force them to work," she said. "In the provinces it's the same. If the husband doesn't work, it's up to the wife to find a way to support the family." Her husband said that he worked occasionally as a carpenter but that "I'm too old now to work." He is 47, one year older than his wife. While she is away, the men in the family tend to the

house and it is immaculate, as if cleanliness was a fetish here at the edges of the dump. The little rooms are free of even a speck of dust. A pet kitten and a dog are fluffy and clean. The few pots and pans gleam with scouring. With the mountain of garbage to tempt them away, there are almost no flies in this tiny, spotless house. But during the hot and muggy nights, while her family sleeps and Janoras sits and weaves her baskets, it swarms with mosquitoes.

It is uncanny how Janora's graphically depicted story could be the story of any waste picker at any landfill in India, Thailand or the Philippines, countries separated in space and time and economic, social, political and cultural realities. To begin with we draw out the significant elements that jump out at us from Janora's story,

- Waste picking possibly ranks lowest in the occupational hierarchy in any country that it is carried out
- Waste picking is an occupation with low or non existent entry costs; it is
 often the first refuge of migrants who find it difficult to get other forms
 of work. However, they continue, oftentimes for decades thereafter
 because there are no bosses; more worker control and choice over
 what to do and more freedom
- The conditions of work are uniformly horrific but the income earned is usually higher than the minimum wage
- It is a sector where there is a preponderance of women, usually women who are defacto the virtual heads of their households being the principal earning members. In Pune for example a study found that 45% of the women contributed more than 50% to the household income¹²
- Despite the intense competition for limited recyclables, there is a strong sense of camaraderie among the collectors
- There is often an element of specialisation in the items collected and traded
- Men tending to the children and the home and women going out to work are quite acceptable. In the words of a Pune waste picker "I went to work like a man and he cooked and cleaned and took care of the house."
- The homes of waste pickers are usually immaculate

¹² Chikarmane, P, Deshpande, M, and Narayan, L, Report of Scrap Collectors, Scrap Traders and Recycling Enterprises in Pune, ILO, 2001

2.1 Critical Issues: Key problems of waste pickers

2.1.1 Hazardous conditions of work affecting health and safety

Waste pickers sort, grade and sell the collected waste to scrap traders. The recyclable material is further sorted, traded, packed and supplied as raw material to reprocessing and manufacturing industries.

Typically, waste pickers carry out their work amidst mounds of garbage in inhuman and hazardous conditions. Their dignity, health and mortality are severely compromised because of their conditions of work. The harsh conditions of work are offset by the fact they often have more freedom in comparison with wage employment and a greater degree of control over their earnings. Waste pickers are economically marginalised and sometimes belong to the most socially excluded groups in their respective countries such as the *Dalits* in India.

In a study carried out in Pune, India, in a 5 percent sample of waste pickers there was one incidence of Tuberculosis, 3 of occupation related accidents, 6 respiratory tract infections, 9 major injuries including falling from/into garbage bins, 1 eye infection and 36 cases of severe musculo-skeletal problems (Chikarmane, Deshpande, Narayan, 2001).

A study of the health conditions of waste pickers carried out by Chintan in New Delhi¹⁴ revealed that,

- 1. Waste pickers have very poor access to basic facilities such as sanitation, clean water or clean household energy.
- Waste pickers believe that washing and bathing is an essential part of health and hygiene but state that they are unable to do so due to the lack of facilities. They believe that a dirty appearance contributes to their increased harassment.
- 3. Despite their low levels of education, 33% of men, 47% of women and 49% of children Waste pickers were immunised against tetanus. They were aware of upto two diseases among men (20.11%), one disease among women (28.13%). Among children, 44.23% were not aware of any diseases, although a small fraction of 7.69% was aware of more than four diseases. Many waste pickers have also worked in other fields and built up other skills previously.

¹⁴ Chintan Environmental Research and Action Group, Wasting away: a study of health status of waste pickers in Delhi, 2003

- 4. A fifth of the respondents stated that they had picked medical waste. Sixteen percent of the men state that they have picked up thermometers containing mercury and 6% of the children can recall handling or dealing with mercury, locally called PARA. Sixty on percent of the men and sixty two percent of children also recalled burning sensations in parts of their bodies when they work, such as the deadly dioxins that cause cancers and developmental problems.
- 5. Most of the women continued to work as wastepickers when they were pregnant, as a result of which their unborn children were also exposed to various environmental hazards. They also believe that this was detrimental to the health of their children.
- 6. Most waste pickers have been doing this work for several years. This suggests that apart from a long duration of exposure, many of them were exposed to various environmental contaminants as children. This puts them at significantly greater risk than waste pickers without such exposures during childhood.
- 7. Seven percent of the children were tested positive for round worms and seventeen percent were found to suffer from chronic gastro intestinal track (GIT) diseases. Amongst women, twenty-four were tested positive for round worms and three percent for hook worms, while another twelve percent of them suffered from chronic gastro intestinal problems. These could not only be linked to the poor quality of sanitation and water available to them, but their contact with waste, which also contains faecal matter.
- 8. There is a clear link between the wastepickers' working and living-conditions and health. This is evident from the fact that 84% of children suffered from anaemia. This could also linked to their exposure to toxic chemicals which may have prevented the absorption of iron.
- 9. Fever (25%) and GIT (17.13%) were the most frequent recurring illnesses amongst children. For men, the study indicated that fever (11.41%), Upper Respiratory Tract Infections (URI) with fever (8.70%) and other GIT (8.70%) were amongst the most commonly recurring illnesses. Amongst women, the trend was GIT (18.75%) and body aches of an unknown origin (18.75%)
- 10. Almost 31% of the men, 44% of women and 16 % of the children recall being hospitalised. Among children, 5 out of 7 cases were hospitalised due to accidents, 7.61% of women were hospitalised due to accidents, injuries & burns.

- 11. A substantial amount of the wastepickers, earning is lost due to illness. Calculations suggest that amongst adults, this is approximately Rs. 674/period of illness for about 5-7 days, and approximately Rs. 485 amongst children for a comparable duration.
- 12. Most of the women considered their workplace unsafe. As high as 80% of them stated that they were beaten during the course of their work. The study showed that rather than the nature of waste or its potential health impact, the women perceived the police as the single most important factor that made their work unsafe.
- 13. Almost 24% of the men and 17% of the women visit private practitioners of various kinds. However, in times of an emergency such as hospitalisation, they approach government hospitals. The experience with doctors sited that 23.44% of women, of 19.23% children & 15.22% of men were not satisfied. In part, this was due to the bad behaviour of the doctor.

While it is generally accepted that morbidity among waste pickers is higher, it is not often possible to establish a direct correlation between the occupation and the disease because the living conditions are bad as well. In Thailand for example, government departments still cannot find a disease that occurs directly from the waste (Department of Environmental Quality Promotion, 2005)¹⁵. However there is direct proof that buyers of old and used goods, waste collectors, and the villagers living near the area are susceptible. The research done by Srisak Soonthornchai and Wannawadee Poonporksin (2003, Ibid) refer to the health effects on people who work closely with waste. Based on their surveys of 276 individuals consisted of waste collecting workers, families of the workers, and tricycle drivers who collect waste in six provinces namely Ubonrachatani, Ranong, Phuket, Phitsanulok, Kamphangphet, and Samutprakarn Province revealed that all of the 276 individuals examined had high manganese, arsenic acid, lead, and chromium.

The in-depth interviews on the officials who collect, transfer, and destroy the municipality's waste, the waste collectors, waste buyers, and general public and communities around the landfill site in Khon Kaen Province municipality in Thailand which was conducted by Lertchai Charouentanyarak and others (2002)¹⁶, had similar findings. The sample group often get injured from sharp objects, got rash when they played around the pond around the landfill area. It is also reported that there are signs that they could not breathe very well, their eyes often hurt from the dust and flames from the burning of the waste.

¹⁵ Department of Environmental Quality Promotion. 2005. Hand Phone's Toxic. Green Path Journal.

¹⁶ Lertchai Charoentanyarak and others. 2002. Study Project to analyze the health effect from the Khon Kaen municipality's policy on waste management.

There are also signs that they could not breathe very well as they had to inhale the smell and the dust. The people living near the area often got sick from diseases relating to alimentary canal as there were large numbers of flies in the area. Some could not breathe properly. The foul odour emanating from the waste caused them to feel dizzy and get rash. Most of the male workers drink and smoke.

In the Philippines, special medical missions conducted by the volunteer doctors with Kadamay a nationwide alliance of urban poor associations concludes the following findings in Payatas and Smokey Mt. II open dumps.

Five leading causes of deaths or mortality amongst:

Children	Adults
Malnutrition	Tuberculosis
Diarrhea due to Cholera	Malnutrition and foodpoisoning from eating spoiled and contaminated food from the dump
Respiratory infection leading to TB	Emphysema
Cough and cold leading to Bronco Pneumonia	Diarrhoea due to Cholera
Dengue	Dengue

2.1.2 Lack of recognition, labour rights and social protection

Waste pickers are unrecognised, unorganised and unprotected recycling workers. They are street entrepreneurs at the base of the recycling pyramid. They have no employer -employee relationship with the scrap traders to whom they sell the recyclable material the municipal governments whose waste handling costs they reduce the industries that source the waste materials as raw material. Therefore, waste pickers are not recognised as workers; are daily earners with no security of earnings; have no access to formal institutional credit; have no social protection or security.

While in India and Thailand, there is as yet no actual ban on waste picking, the Philippines has banned scavenging via its RA9003 legislation. In India, what began as an initiative of the KKPKP¹⁷ demanding that the Pune Municipal

¹⁷ This part taken from Chikarmane,P., Narayan,L. Organising the Unorganised: case study of the Kagad Kach Patra Kashtakari Panchayat (unpublished) 2004

Corporation recognise and issue identity cards to waste pickers, has effectively become a precedent with Maharashtra state issuing a state order on the subject.

2.1.3 Policy Advocacy and Responses

 Seeking State recognition of scrap collectors as "workers" and scrap collection as work

The KKPKP spearheaded the struggle for recognition of scrap collectors as "workers" and scrap collection as "work" by the Municipalities and later the State government through a series of processes. Foremost among them was organising and mobilising scrap collectors through public rallies and demonstrations. The above arguments formed the basis for the demand for the municipal endorsement of photo-identity cards issued by the Union. The demand was put forth in 1993 by means of several public demonstrations in which thousands of members participated.

The Pune Municipal and Pimpri Chinchwad Municipal Corporations conceded to the demand in 1995-1996 and became the first municipalities in the country to officially register (through the KKPKP) and endorse the identity cards of waste-pickers in recognition of their contribution to the management of urban solid waste. The endorsement authorises waste-pickers to collect scrap. This has since been followed by a notification from the Maharashtra State government directing municipalities to register waste-pickers and issue identity cards and pursue methods of integrating them into solid waste collection through their organisations or through NGOs.

Municipal endorsement of identity cards transformed the stereotypical image of waste-pickers in their own eyes as well as those of the public. Scrap collectors have independently used the I cards creatively, sometimes as bail when arrested on suspicion and sometimes as surety when they did not have enough capital for immediate payment while buying scrap. Today the average waste-picker on the street is clearly able to state her contribution to the city's cleanliness, to argue her claim for space to sort the scrap, to convince citizens that she is not dirty because she cleans the waste that they generate and to confront the police saying she earns an honest livelihood.

2. Claiming State resources on the basis of State recognition

a. Medical Insurance

The KKPKP argued that while the financial benefits (savings in transportation costs) accrued to the municipalities, the costs (health costs) of contributing to municipal solid waste management were borne entirely by the waste-pickers labouring under abominable conditions of work leading to higher levels of morbidity. The argument was substantiated by the findings of studies that showed that waste-pickers suffered from occupation related musculo-skeletal problems, respiratory and gastro-intestinal ailments. Scrap collectors, particularly women, tended to ignore minor illnesses till they assumed dangerous proportions and became chronic 'conditions'. Only a 5 percent sample of scrap collectors in Pune had one incidence of Tuberculosis, 3 of occupation related accidents, 6 respiratory tract infections, 9 major injuries including falling from/into garbage bins, 1 eye infection and 36 cases of severe musculo-skeletal problems (Chikarmane, Deshpande, Narayan, 2001).

In 2002-03 the Pune Municipal Corporation became the first municipality in the country to institutionalise the Scheme for Medical Insurance for all Registered Waste-pickers in its jurisdiction. The above arguments are detailed in the docket (prepared by the Municipal Commissioner) that was presented before the decision making bodies of the PMC. The payment of the annual premium to the New India Assurance Company has become part of the annual municipal budget. Hospitalisation costs of up to Rs.5000 are reimbursed by the insurance company. Claims are processed through the KKPKP.

b. Education

The KKPKP argued for the inclusion of children of waste-pickers in the Central Government aided Scheme for Pre-Matric Scholarships to Children of those engaged in Unclean Occupations the basis of municipal recognition (endorsed I cards). Until then only children of night soil carriers were considered eligible for the scheme that was implemented through schools. The government initially refused to accept that waste-picking was an "unclean occupation". The press played a very effective role in this campaign and articles titled "Government finds ragpicking too clean to merit help!" alongside a photograph of a waste-picker inside a garbage container, hit the headlines. In 2001, the Maharashtra government conceded to demand that the municipal endorsed I card

constituted proof of "unclean occupation" and extended the benefits of the Scheme to the children of waste-pickers.

c. Space

In 1997 the KKPKP successfully argued for the right of waste-pickers to use by-lanes without obstructing traffic, as sorting sites for scrap. The argument elaborated on how the municipality allocated parking space for the cars of the rich but could find no space for waste-pickers to sort the scrap that had been generated not by them, but by the relatively better off citizens.

In 1998 the organisation also managed to get constructed space gratis for running a co-operative scrap store within the limits of the Pimpri Chinchwad Municipal Corporation.

Integration of waste-pickers into the doorstep collection and management of urban solid waste

In 1998, the Hon. Supreme Court of India set up an Expert Committee on Solid Waste Management in response to Writ Petition no.888 of 1996 filed by Almitra Patel and others. The KKPKP was asked to send recommendations to the Committee, which it did. These have been incorporated in the final report of the Committee.

The Ministry of Environment and Forests, Government of India formulated the Municipal Solid Waste Handling Rules, 2000 based on the recommendations of the Committee, after directives from the Hon. Court. The Rules direct the municipalities in 41 Class I municipalities to extend their mandatory responsibility (collection from common points) and undertake measures for door-step collection of waste and citizens education for source segregation. Although the Rules do not make specific mention of waste-pickers, they are explicit in offering a wide range of choices to the municipalities in the systems that they may want to adopt depending upon local conditions. Caught between the compliance criteria for collection and budgetary constraints, municipalities have been experimenting with different methods with varying degrees of success. Contracting out the system of doorstep garbage collection, partly or fully, to both local and multinational operators is the most popular because there is a strong lobby that believes that privatisation of garbage collection is cheaper and more efficient. Frequently these measures displace waste-pickers as has happened in Nasik, Maharashtra where they are unable to access the scrap since the garbage is carted away by the contracted parties.

The integration of waste-pickers into the doorstep collection of garbage is the one of the methods that will guarantee their access to scrap; improve their working conditions; improve their earnings; and transform the status of the occupation from scavenging to service provision. In order to demonstrate this, the KKPKP initiated "Swachateche Varkari" (harbingers of cleanliness) which is promoted as Pune's only eco-friendly doorstep garbage collection service offered through its members. The KKPKP does not function as a contractor but promotes the service. About 400 members are involved in the collection of source segregated garbage from 40000 households and commercial enterprises across the city. They retain the scrap for sale through the usual channels and deposit the organic garbage in the municipal container or the vermiculture composting pit. Apartment blocks contract the waste-pickers and pay them a monthly service charge per apartment. The rates vary depending upon the location and the class of citizens living in that particular neighbourhood. Effectively they fill the gap between the generators of garbage and the neighbourhood garbage container. The Pune Municipal Corporation is now officially promoting this programme.

Mangal Gaikwad resides in a slum in Aundh. The difference that her involvement in door-step collection and in the Union made to her life is presented in her own words. "Today I earn Rs.3000 from doorstep collection and the sale of scrap. The residents in the area who used to frown at me while I was at the garbage bin, now know my name and greet me. A resident gave me a second hand bicycle. I had never ridden one before. Today, I ride to work on that cycle. When I was a child I used to envy the children who went to school with their bags and water bottles while I had to go waste-picking. Since my work day is shorter now I was able to attend the literacy class in my slum. I am now literate. I am the Treasurer of the credit co-operative and the representative for my slum. I used to be terrified of my abusive alcoholic husband. Twice I sent him to a de-addiction centre. He stopped for a while but continues to drink. I am no longer terrified of him. I do not give him money to drink. I have bought a bigger house for Rs.65000 from my savings and a loan I took from the credit co-operative". (Source: Unpublished documention of KKPKP)

The transition from waste-picker to service provider has not been simple for waste-pickers. It has required them to change their dress, demeanour and

styles of work. Since they are ordinarily abused or ignored by the middle classes, learning to relate with them has been a new experience. They have perforce learnt to be punctual, regular and cordial. Till date, the Pune Municipal Corporation has not pursued the privatisation through the contractors' route because of the presence of a strong municipal workers union and an equally strong waste-pickers union, both of which would oppose the move, albeit for different reasons.

Till 2005, the KKPKP was poised at an interesting node in the struggle where the livelihood rights of waste-pickers may come into direct conflict with the struggle of organised sector municipal workers to protect and extend their preserve. It is significant to note here that the municipal conservancy workers and waste-pickers share the same caste and social background. The fact that door-step collection of garbage was never the mandatory responsibility of the municipalities and the prohibitive costs of hiring regular labour to fulfil that added responsibility, offered the space for waste-pickers (through the KKPKP) to negotiate their claims for public-private partnerships to fill the gap between the door-step and the common collection point, without antagonising the municipal unions.

The new policy framework opened up possibilities for the integration of organised waste-pickers into systems of solid waste collection (through public-private joint ventures), but also constituted a threat to their livelihoods in cities where they were not organised. It is a strange paradox that while on the one hand NGOs and MBOs are preoccupied with the need for policy change in favour of the poor, there are so few that are willing to organise waste-pickers to explore the possibilities that exist in a favourable policy environment in this specific context. Even those NGOs (Centre for Development Communication, Jaipur and Naapur; Exnora, Chennai and Hyderabad; Forces, Mumbai) that have entered into solid waste collection contract arrangements with municipalities have chosen to recruit/involve slum youth for doorstep collection rather than the waste-pickers in those cities. This only substantiates the established fact that the improvement in the conditions of work in any sector leads to the displacement of women by men, the lower castes by the upper castes and informal sector workers by corporate entities.

4. SWaCH (solid waste collection handling) Pune India's first municipal supported enterprise of waste pickers

SWaCH Pune Seva Sahakari Sanstha is India's first wholly owned cooperative

of waste pickers and other urban poor. It is the institutional outcome of the door to door waste collection initiative of the Kagad Kach Patra Kashtakari Panchayat to integrate waste pickers into door to door collection of source segregated waste thereby improving their conditions of work and upgrading their livelihoods. SWaCH is taking over the work accomplished in the pilot which covers 200000 households in Pune through 1500 SWaCH waste pickers who have become service providers. The Pune Municipal Corporation is committed to support the coop for 5 years.

SWaCH Pune (solid waste collection and handling) is conceived as a professionally managed social enterprise of the poor in the area of waste management that includes collection, resource recovery, scrap trading and waste processing. SWaCH seeks to provide decent livelihoods in the recycling industry. SWaCH is headed by the Chief Executive Officer assisted by a professional management team. It seeks to transform the conditions of work of waste pickers and to enable them to upgrade their skills and capabilities to reap the benefits accruing from value addition activities and processes. SWaCH is authorised to provide door to door waste collection, housekeeping and other allied services by the Pune Municipal Corporation. Unorganised and without voice in urban planning processes, institutions and forums that affect their work and lives

2.1.4 Exclusive urban renewal policies and solid waste management systems

The non inclusive privatisation of waste collection; pursuit of waste processing technologies that supplant recycling have had a deleterious impact on the lives and livelihoods of waste pickers in many Asian countries such as India, the Philippines and Cambodia.

In India the struggles of waste pickers for protecting their livelihood are being carried on different fronts. In Delhi for example, large scale evictions drove waste pickers already living on the fringes, into the wilderness. Banished far away from the habitations that provide them a livelihood, the long commute does not make it worth their while. Protests have become a common feature. The dhalaos (community waste bins) have been handed over to contractors as part of the privatisation process. The waste pickers now have to 'pay' for the waste that they had free access to earlier. At Pune, the city scale union of waste pickers pre-empted the privatisation through contractors by proposing an autonomous cooperative of waste pickers themselves to carry out the work. Proposing was the easy part. Pushing for it to come to fruition was a 3 year long, laborious process of strategising, protesting and advocating right

from the local body to the State government. The battle lines continue to be drawn but for the moment it is an advantage for waste pickers.

Estimates of the population of waste pickers vary and we do not have an accurate figure. The World Bank has estimated that 1% of the urban populations in developing countries earn their living through collecting and recycling waste. They are seen on the streets in the less developed economies of Asia in India, Bangladesh, Nepal, Pakistan, Thailand, Indonesia, Cambodia, Vietnam and the Philippines, in the large urban centres of Africa and across the cities of Latin America. The greater the level of mechanisation in garbage collection, the greater the numbers pushed to the landfills in the more developed Asian economies of Singapore, Malaysia and Korea. In India about 1 per cent of the working population in is engaged in this sector.

The case of Delhi¹⁸

A sweeping change washed over Delhi from the turn of the century, part of the stated effort by Delhi's planners to transform it into 'A World Class City.' This vision required re-development of vast tracts of land, both for formal recreation and for building purposes. Although several provisions of the various plans that were part of this larger vision will not be detailed, suffice to mention that the urban poor were severely short changed, despite their critical role in the city's functioning. Coinciding with this was a hardening stand against slum dwellers and the informal sector amongst key political figures, a push that was lead by the Supreme Court. Several other Public Interest Litigations have since resulted in demolitions of several scrap shops as part of a larger sealing of illegally created shops. Additionally, on various occasions junk shops in slums were banned on the grounds that they were polluting and responsible for spreading dirt.

Meanwhile, a cabinet minister also closed down the second hand goods market, popularly called the Sunday Bazaar and shifted it to a much smaller area, a few kilometers away, after a gap of several months. He did this because he wanted to convert the area where the Bazaar was held into a green zone. This bazaar was where 1100 registered and an estimated 2000 unregistered persons sold hundreds of repaired, recycled and dismantled items, some salvaged from trash and others bought and repaired. Several junk shop owners would keep aside their intact goods for re-sale in this market. It was the only trade market of its kind.

¹⁸ The cases of Delhi and Pune are from from Chikarmane, P., Chaturvedi, B., Narayan, L. Recycling Livelihoods: integrating the informal sector in solid waste management in India, GTZ, 2008

The demolition of slums has been the most visible policy direction in efforts to remake Delhi as a world city. In the last decade, various estimates suggest that of the 3.5 million people living in slums across Delhi, over one million has lost their homes due to slum demolition. According to the "Hazards Centre", a Delhi-based NGO that has been working tirelessly on housing security for the urban poor, a significant number of demolition and eviction requests have been filed by citizens' groups, particularly Residents' Welfare Associations (RWAs), which do not wish to allow such slum clusters in their vicinity. These are typically in the form of Public Interest Litigations. Some concerns that they have cited include safety, visual pollution and environmental quality. Scrap shops and waste segregation activities have also been identified as undesirable by such groups in their interactions with municipal officials. Chintan's ongoing work with wastepickers and waste dealers suggests that urban renewal policies have had a deleterious impact on their livelihood. A focus group discussion with waste dealers and waste pickers in the Nizamuddin Dargah area was instructive. The waste recycling activities, clustered around a series of junk shops, were demolished on the basis of a court order, after the Janapura Residents' Welfare Association filed a case in court.

The waste pickers say that instead of their customary two rounds of picking, they had to reduce picking to one pheri, or round – route of wastepicking along a given route, compared to the typical two rounds they would take usually. This was because there was no space to store waste, since their slums were torn down. Hence, they were required to sort and sell waste the same day. Furthermore, since they did not have the older junk shops nearby, they were forced to sell materials to at least two different dealers, each trading only in separate, mutually exclusive items, both at a considerable distance. The junk shops took advantage of their market monopoly and offered rates much lower than prevailing ones. Some of them complained that instead of the 150 rupees they earned previously, they were left with less than 80 consequently.

Subsequently, a sealing drive also closed down all junk dealers in the vicinity: In 2006, the Supreme Court asked the municipalities of Delhi to seal all commercial operations operating in residential areas, as they were in violation of the Master Plan 2021. Over 18,000 establishments including recycling establishments in the informal sector were closed down, a policy known as sealing the premises because officially, a lock with a government seal was to be used to indicate the action of closing down. Later, however,

a list of 24 exempted establishments was created to cater to the needs of well-off residents. The list included ATMs, but not junk shops, recycling centers, etc. At the ground level, several junk shops have closed down permanently, unable to withstand a long period of closure without business.

The case of Pune

In Pune, while for the most part there has been progressively increasing support for waste pickers, attempts to mobilise opinion against waste pickers and action against scrap traders are not unknown. A few years ago eviction action was initiated against scrap trade establishments by a Municipal Commissioner on the grounds that commercial establishments enjoyed no protection under slum laws. He contended that slum dwellers were protected because they lived there and he saw little reason why shops should be protected in the same manner. The scrap traders typically operate under the protection and patronage of the local municipal councillors. A protest march of scrap traders resulted in suspension of the eviction drive.



Waste picker at Landfill, Pune, India

The news that scrap trade establishments will not be accommodated in slum rehabilitation undertaken by the Slum Rehabilitation Authority (SRA) has been doing the rounds over the last few years. The grounds being that they constitute a fire hazard. The matter has not come to a head because the rules of the SRA itself are ambiguous.

2.1.5 The economic contribution of waste pickers

Waste pickers directly contribute to reduction in solid waste management costs, as well as environmental costs. For example, the informal waste sector in Pune effectively subsidises the formal waste sector to the extent of \leqslant 3.004.636 per annum in waste handling costs. It handles one third of the waste handled by the formal system. Recovery in the informal sector is 89 per cent as

compared to the formal sector where no recovery takes place. The informal sector operates at lower costs than the formal system. In terms of financial costs, there are no revenues accruing to the formal system, while the informal system operates at a net benefit of € 9.300.082 per annum. The monetised environmental benefit on account of the informal system is higher than the environmental costs of the formal system. The use of non renewable energy resources in the informal system is minimal. The informal system engages twice as many workers as the formal system, 63 per cent of whom are fully dependent upon it for their livelihoods. The proportion of women workers in the informal sector is ten times that in the formal sector. The average earnings in the informal sector exceed the statutory minimum wage. The workers are already recognised and are entitled to certain benefits such as medical insurance because of the existing interventions in the informal sector¹⁹ and especially because they are organised into a trade union and cooperative. As mentioned in the preceding paragraph, policy makers understand critical mass and that is a direct outcome of organisation.

2.1.6 Making the working poor visible

To counter the exclusionary trends in modernising cities today, what is called for is a fundamental rethinking and reshaping of urban plans, regulations, and policies to incorporate the working poor. What is needed, first and foremost, is to recognise that the urban informal economy is part-and-parcel of the economy of towns and cities of the developing world and is here to stay; and that the towns and cities of tomorrow should - indeed must - remain "hvbrid" if urban poverty - and urban violence - are to be reduced. Towns and cities should allow street vendors, hawkers, small kiosks and shops to exist alongside large retail shops and malls; should incorporate waste pickers into modern solid waste management systems; and should support home-based production through basic infrastructure and appropriate zoning policies. The living conditions of the poor often determine their work conditions and growth of urban infrastructure needs to take into account the basic needs of this large population. This will require inclusive, rather than exclusive, urban infrastructure and services; urban zoning; urban regulations and laws; and urban plans and policies. This, in turn, will require inclusive urban planning processes in which representatives of the working poor have a voice.

2.2 Profile of waste pickers

2.2.1 India

¹⁹ For more details see Chikarmane, P., Narayan, L. Study of the Economic Aspects of the Waste Informal Sector in Pune, Kagad Kach Patra Kashatakari Panchayat under contract to WASTE/Skat, GTZ, 2006.

A historical review of the commodities collected by scrap collectors in Pune²⁰ suggests that bones, rags and paper were among the first commodities to be collected. While the practice of collecting bones has steadily declined over the years, 20 % of scrap collectors reported to having collected bones sometime in their lives and 5 % continue to do so. The collection declined on account of the decline in demand following complaints about hygiene etc. In caste Hindu society there is a historical and cultural association between the *Mahars*²¹ and *Matangs*²² and 'bones'. Members of both castes had rights to skin the hides of animal carcasses and eat carrion.

The association of waste-picking with bones and paper that had to be collected from the streets and garbage led to the involvement of Mahar (including Neo-Buddhist²³) and *Matang* women. Even when other scrap commodities became available they remained the only ones who would soil their hands. The occupation came to have a low status primarily because Dalits were involved and because of the filthy work environment. Dalit women also had fewer restrictions on mobility than women from the other castes. These factors precluded the involvement of even the very poor among the other castes and accounts for why the other balutedar castes ('kunbis', the small agriculturists and those providing village services like oil pressers, gardeners, ironmongers, barbers, tailors and others) that migrated during the drought did not enter this occupation. It also accounts for the negligible presence of Dalit men in wastepicking and their higher presence in itinerant buying. Itinerant buying involves the use of capital and relatively better conditions of work and therefore has a marginally better status. Not many Dalit women were accepted as domestic help in caste Hindu society although they were employed in the homes of the Parsis, Muslims, Christians and the British. This meant that they had very little choice because they had no access to capital, no skills and no education. This supports the graument that if the sources of existence are under pressure, people fall back on familiar social mechanisms to promote their own interests²⁴ (Bremen 1994). The fact that no other social category would start waste-picking

²⁰ Chikarmane, P., Deshpande, M., and Narayan, L., Report of Scrap Collectors, Scrap Traders and Recycling Enterprises in Pune, ILO, 2001

²¹ The Mahar was entitled to carry all the dead bodies of animals, cows and buffaloes in his village, but was obliged to give the skin of the buffalo to its owner.

²² Mang (or Matang) was one of the 12 balutedars (village service providers), and his main job was to make the leather ropes from the skins of cattle and several other things like leather bag for fetching water from the well for irrigating the land, thongs, whips used by the cultivator. He also acted as the village watchman. Though assimilated in the village from time immemorial, and participating in all the festivities and activities of the village, the Mangs were not entitled to any Haqs and were not regarded as Balichabhau i.e. Brother of Bali, the cultivator.

[•] Grant Duff, A History of the Maharattas, Oxford University Press, 1921 Vol.1

²³ Neo-Buddhists are the Mahars who embraced Buddhism after the Dalit leader, Dr Babasaheb Ambedkar propagated that conversion to Buddhism was the only avenue open for the 'untouchables' to liberate themselves from the oppressive clutches of caste ridden Hindu society.

²⁴ Breman, J., Hawthorne, G.P., Footloose Labour, Working in India's Informal Economy, Cambridge University Press, 1996

would itself offer some measure of security and assurance of work to waste-pickers. Thus while entry into scrap collection appears to be 'closed' it has to do with the 'particularistic tendencies' (Breman 1994) of the labour market, rather than extraneous entry barriers and the fencing off of the occupation by the existing workers.

Chikarmane, Deshpande and Narayan in their study of waste pickers in Pune found (2001)²⁵

- Every other scrap collector is under 35 years of age
- 9 out of 10 wastepickers are women 2 out of 3 itinerant buyers are men
- 25 per cent of the women between the ages of 19 and 35 are widowed or deserted.
- 9 out of 10 women are illiterate 5 out of 10 men are illiterate.
- Every scrap collector is a Matang, Mahar or Neo-Buddhist
- Every third household is woman headed
 One in every two households has up to 5 members
- 50 % have photo-passes that protect them from summary eviction
- 50 % have own water connection
- 10 % live in undeclared slums
- 50 % have own electric connection
- Average size house 100 sq.ft.

Scrap collectors²⁶ in Pune²⁷ are most likely to be illiterate, landless, *Dalit* women migrants from the Marathwada region of Maharashtra state aged between 36 and 50 years who have been resident in the slums of Pune for at least two decades. The data show that fresh entry into scrap collection still continues albeit of the same social category. It however leads to increase in internal competition and pauperisation of existing workers and the displacement of the more vulnerable among them. The primary data support Breman's theory of fragmentation of the labour market as a result of increasing competition among workers in the informal sector. Analysis of the data on participation of scrap collectors in allied occupations substantiates the above argument.

²⁵ Chikarmane, P, Deshpande. M, and Narayan. L, Report of Scrap Collectors, Scrap Traders and Recycling Enterprises in Pune, ILO, 2001

²⁶ Scrap refers paper, plastic, metal, glass and other recyclable waste commodities

²⁷ Chikarmane, P., Deshpande, M., and Narayan, L., Report of Scrap Collectors, Scrap Traders and Recycling Enterprises in Pune, ILO, 2001

In North India, there are two distinct kinds of migrants who pick waste. One is rural workers who come to cities in search for work. Many are Dalits, which has a different connotation in North India. While it also reflects a low caste, there are no Mahars and other castes as seen in Maharashtra. Instead, various other persons, belonging to low castes and who are poor, undertake this work in cities and are also known as Dalits. In this case, it is primarily men who come to the city. The second category is that of migrants from Bangladesh, who work along with their families in this occupation. In Delhi, in the early 1990s, there were waste pickers from as far away as Salem, South India. These demographics have altered to primarily include only North and East Indians and alleged Bangladeshis. Almost all waste pickers are under 45 years. Of the scrap dealers, 78% were found to be waste pickers who had accumulated some money and had some elementary education²⁸.

Srishti in its study of waste management in 2002 in Delhi found that,

- 76 % of waste pickers were men
- 52 % were Muslims, the rest were from from Dalit communities
- 77 % were illiterate
- 97 % were migrants
- 86 % had migrated on account of poverty
- 75 % see no other occupational option

2.2.2 Thailand

Srisak Soontornchai and Wannawadee Poonpoksin (2003)²⁹ in their study of 244 waste collectors, 22 families of waste collectors, and 10 Saleng (individuals who ride small motorcycle or trucks to collect waste) found that prior to waste collection the study found that waste pickers had been farmers, gardener, construction workers, drivers, general employees, factory workers, and others. Most are poor, jobless, lowly educated, or were too old. They became waste collector through the invitation of friends or relatives. Some combined economic activities while others had given up their earlier occupations. The research focused on six provinces namely Ubon Rachatani, Rayong, Phuket, Phitsanulok, Kamphaengphet, and Samutprakarn. It was revealed that there were more women than men. The youngest waste collector was 10 year-old while the oldest was 66 year-old. Most were around 31 to 40 year-old, married, and had the education background of primary school or lower.

²⁸ Chaturvedi, B. In Khushwant Singh (ed) City Improbable: An Anthology of Writings on Delhi. The Kingdom of Waste. Viking, Penguin India. 2001. Chintan, Study on Informal Recycling Sector of Delhi. 2001.
29 Srisak Soonthornchai and Wannawadee Poonpoksin. 2003. Department to Promote Waste Collecting Labor's Health and Environment (in Thai)

Most importantly, the dominant feature of this job that draws interest and takes not much time to decide to work in this field is because there is little capital needed, it is not risky, it is not limited to how much you can do, it is independent, and lastly half of the waste collectors that have been working for more than five years revealed that 4 out of 5 are happy with their job and in some family, this job has been inherited from grandparents generation to grandsons/daughters generation, which is more than four generations.

2.2.3 Philippines

There are estimated to be 2590 (2072 male and 518 female) itinerant waste buyers and 3750 (2045 male and 1705 female) dumpsite pickers in Quezon city in the Philippines. Most are full time workers.

2.3 Conditions of work

2.3.1 India

In Pune³⁰, one in every four of the scrap collectors works all seven days of the week. Waste-pickers maintain the worst and the longest working hours with almost 10 per cent leaving their homes before 6 in the morning and a third definitely before 8 am. Many younger women manage to leave for work only between 8 and 10 am in the morning because they shoulder the additional responsibility of cooking and cleaning for their families. Despite this, it is usually



Street picker, Pune, India

the women who leave earlier in the morning. Likewise more women return home only after 7 pm. Notwithstanding the fact that some enter the occupation because of time 'flexibility', half actually put in between 9 and 12 hours of work for 6 days a week. Hardly anyone works part-time and 50 per cent work an 8 hour day.

The actual time spent by most scrap collectors in commuting to and from the place of residence to the place of work is over an hour. Ten km is the distance they need to cover daily, over and above the travelling for scrap collection.

³⁰ Chikarmane, P, Deshpande. M, and Narayan. L, Report of Scrap Collectors, Scrap Traders and Recycling Enterprises in Pune, ILO, 2001

³¹ Thai Health Promotion Foundation. Thai Health Promotion Foundation's three years action plan 2005-2007 (in Thai)

Walking at the work site for collecting scrap itself takes up 5 hours or more for more than three fourths of the scrap collectors.

Most itinerant buyers (men and women) sort their scrap outside the trade establishment. Waste-pickers have to be more discrete in choosing their sorting sites and many manage to negotiate for some space near the collection site itself. Such sorting involves twice the labour as they have to retie the sacks to transport it to the trader. Only half the waste-pickers have the facility of sorting near the trade establishment itself, thus reducing the time spent.

One in every two waste-pickers walks to the trade establishment carrying the scrap on her head. Those who carry heavier loads are usually the ones who hire transport, although a few, carry loads of over 75 kg on their heads and make repeated trips to the trade establishment in order to save transport costs.

Most young, wastepicking women leave home for work after the intake of a single cup of tea. Male, itinerant buyers on the other hand usually leave after a heavy home cooked breakfast. Lunch is usually skipped, some women have a cup of tea at work and return home to an early dinner of 'bhakris'- bread made of jowar-, rice, dal and the cheapest vegetable available on that day. They eat meat once a week.

Hard working conditions, poor living conditions, unhygienic environs notwithstanding, one in three scrap collectors claims she does not suffer from any minor or major illness. 'We do not lead protected lives and are the healthier for it' they claim cheerfully. 'You will fall ill within a day of doing our work.'

2.3.2 Thailand 31

The waste collectors work for an estimate period of about 6-10 hours per day. They work on the day when the truck collecting the waste pours the waste at the dumping sites. They work in different period, for example from 6.00-7.00 am, 12.00-1.00 pm, before 5.00 pm, and before 8.00 pm. The kind of waste in the dumping sites apart from having old and new waste, there are also garbage, refuse, and hazardous waste (for example chemical fuel, medicine bottles, and pesticide). Contaminated waste is also present such as used condom, diaper, and sanitation clothes. Others are metal waste, spoiled food, animal remains, wood, stick for meatball, and dangerous item such as gun bullets.

In their work, half of the waste collectors wear gloves. Some wear rubber glove

³¹ Thai Health Promotion Foundation. Thai Health Promotion Foundation's three years action plan 2005-2007 (in Thai)

while others wear gloves made from clothes. Some buy it for themselves, while others find it at the dumping site. Most use a hat to cover their hair but as most of the materials come from the waste therefore the quality in terms of protection is not very good. More than half use clothes to cover their noses and mouths, but all do not wear goggle to prevent waste from getting into their eyes or sunglasses to prevent constant bright light, hot weather, and dust coming from metal. They use short hooks to get the waste that they want. Some use bare hands depending on their expertise and experience. During their work, they have to bend down, look up, turn their wrists, and move around all the time. However, almost all waste collectors do not clean their bodies after work. When they finish at collecting the waste they have to put the waste onto the side of the street to wait for the buyers or to sell it later. Usually, they would sell it to antique shop buyers or waste factory. The waste that could be sold is divided into six kinds which are:

- Any kind of paper includes office paper, newspaper, magazine, comic's book, brown color box (made from paper) and general types of papers.
- Remnant of metals includes metal from construction works (steel rod, metals in the car, nails, iron, steels, and any other kind of metals)
- Plastic includes water bottles, plastic jars, plastic glasses, advertisement board, oil gallon, used CD, DVD, PVC tube, and general plastics.
- Glass bottle such as fish oil bottles, liquor bottles, beer bottles, red bull bottles, m150 bottles, and broken glasses.
- Different kinds of aluminum such as the edge of the windows, mosquito wire screen, automobiles' wheel, stainless, and every kind of aluminum.
- Copper includes electrical wire, mercury, burnt copper, brass, electrical wire made from aluminum, and others.

Occupation and income

All work fulltime as waste collector. The lowest income per day is 51 baht. The highest income is 200 baht. Most has a daily income of around 51-100 baht, which they have to used to take care of about 2-3 members of their families. More than half is in debt.

Workplace

Their main workplace is the landfill site. We can divide the waste collectors working near the landfill according to the owner of the landfill. They can be divided into two kinds namely:

- Waste collecting workers in the landfills owned by private companies which receive concession from the government such as in Bangpla Tambon Administrative Organization (TAO) in Samutprakarn Province.
- Waste collecting workers in the dumping sites belonging to the municipality. In this case the municipality divides the waste according to which waste items the workers will collect. This kind is evident in Kamphangphet Province, Phitsanulok Province, Rayong Province, Ubonrachatani Province, and Phuket Province.



Waste Picker in Thailand

Other kinds of workplaces for other groups includes roadside collection where there usually would be waste bins on the two sides of the road and in front of the houses and stores. Each person would have his/her own perimeter which is "known" among others. There are different ways of collecting and transferring the waste. For example, some would carry a big bag and walk along the path. Some have small two wheels carts and will collect the waste along the way until the carts are full and then will take the waste to the buvers. Some drive a four wheel tricycle and buy the waste from other collectors but at the same time also collect the waste themselves. In rare case would the collectors drive pickup truck, motorcycle, or tricycle.

Lifestyle: Apart from collecting the waste from the dumping areas, the waste collectors also used the area to rest and have their suppers, and drink water. Some families bring small children to play or allow them to run near the waste sites. In some areas, food vendors would come to the area to sell small snacks, fruits. BBQ meatballs, and others.

3 Status of Organisation and Integration (case studies of organising experiences)

Existing studies indicate that about 1 per cent of the population is engaged in the waste informal sector in India³². Numerically waste pickers in India possibly

³² Bartone, C. The Value in Wastes. Decade Watch. 1988; September: 3-4. Chikarmane, P., Deshpande, M., Narayan, L. Report on Scrap Collectors, Scrap Traders and Recycling Enterprises in Pune, International Labour Organisation, Geneva 2001 Medina, M. Informal Recycling and Collection of Solid Wastes in Developing Countries: Issues and Opportunities. Tokyo: United Nations University / Institute of Advanced Studies Working Paper No. 24, 1997: 1-2.

outnumber those in any single country in the world. India has a growing consumer base that generates increasing quantities of waste and robust recycling facilities that create a demand for recyclables. The interests of waste pickers and itinerant waste buyers are tied in with those of small and medium scrap processing enterprises and also many large industries that source scrap as raw material. The environmental consequences of unchecked dumping of waste are well known and documented. The economic prospects for the recycling sector therefore seem to be promising.

At the national level there has been growing recognition of the existence and value of recycling and the role of waste pickers in the recycling chain. There has also been acceptance of the need to drastically change the conditions of work by integrating them into solid waste management. The need to build linkages between the formal and informal stream and possible institutional ways of doing this has also been articulated.

The organisation of waste pickers is geographically not very extensive across India. There are 24 organisations of waste pickers or those that work with waste pickers in India. Most are NGOs registered as public trusts or societies. Many of them have also registered cooperatives so there are multiple entities of the same organisation. There are however some organisations that have reached a certain stage of organisational development, depth and scale in their work with waste pickers. SEWA and KKPKP are the oldest among the membership based organisations. Almost all the organisations work in Tier I (metros) and Tier II cities (million plus population).

All the 24 organisations are part of the National Alliance of Waste pickers in India. This is a loose non-institutionalised network that member organisations relate and respond to. It had its first meeting in 2005 and has since been meeting about twice a year. (Please refer Annexure III for Table I: Profile of Organisations of waste pickers and Organisations working with waste pickers in India). The Kagad Kach Patra Kashtakari Panchayat functions as the secretariat of the National Alliance. The latest initiative of the National Alliance was a National Consultation held in July 2008 to discuss the draft National Policy for Ensuring Decent Livelihoods in the Recycling Industry (A policy for inclusion and integration of the informal recycling sector/industry in the process of solid waste management). The draft policy has been prepared by a team of lawyers³³ after consultation with the National Alliance as part of a global project on laws for the informal sector.

³³ Women in the Informal Economy Globalisina and Organisina, Harvard University www.wiego.org

SEWA and a few other organisations have established waste picker cooperatives that operate in specific pockets in their respective cities; likewise KKPKP (trade union of waste pickers) and the Pune Municipal Corporation have supported the setting up of SWaCH (solid waste collection and handling) a cooperative of 3000 members for waste collection and processing across Pune city; Nidan in Patna has set up a private limited company to take its waste collection work to scale; Chintan in New Delhi has scaled up to pick waste from the New Delhi Municipal Council. Infusion of human, material and technical resources will enable the large scale models to be tested and strengthened.

The existing efforts in the work with waste pickers in India can be broadly classified as follows.

- Organisation of waste pickers into trade union/cooperative/Self Help Groups/ Associations
- Issue of photo-identity cards to waste pickers in a few cities these have been endorsed by the municipalities
- Elimination of child labour in the sector and promotion of education among children of waste pickers and child waste pickers
- Increasing access to credit through self help groups and credit cooperatives
- Market based interventions such as cooperative scrap stores
- Interventions to integrate waste pickers into solid waste management in order to improve their conditions of work of waste pickers
- Increasing access to social protection such as life insurance and medical insurance
- Research to establish and quantify the contribution of waste pickers to solid waste management
- Advocacy for all of the above.

3.1 India: Case studies of integration experiences³⁴

There are 24 organisations of waste pickers or those that work with waste pickers in India. Most are NGOs registered as public trusts or societies. Many of them have also registered cooperatives so there are multiple entities of the same organisation. SEWA and the KKPKP are the oldest among the membership based organisations. Almost all the organisations work in Tier I (metros) and II

³⁴ This section taken from Chikarmane, P., Chaturvedi, B., Narayan, L. Recycling Livelihoods: integrating the informal sector in solid waste management in India, GTZ, 2008

cities (million plus population). All the 24 organisations are part of the National Alliance of Waste pickers in India. This is a loose non-institutionalised network that member organisations relate and respond to. It had its first meeting in 2005 and has been meeting about twice a year since.

Relegated quite literally to the garbage heap, waste pickers and others in the waste collection and recycling economy are either invisible in relation to other workers in the informal economy or are shunned. Usually more difficult to organise they remain excluded not only from government interventions but also from NGOs and other development organisations and lack voice.

Typically, the poor define their needs as jobs and credit. It was no different with waste-pickers. In the waste-pickers' own words what they did was not "work" but "kachra chivadne" (rummaging through garbage). Work was "a secure job in the government or in a company". The reflective and analytical process that the activists and waste-pickers jointly engaged in focussed on understanding the concept of work. It was during this process that the waste-pickers acknowledged that waste-picking had been a means of earning that they had been pushed into when they migrated to the city in large numbers during the drought in 1972. Then, even more so than now, their caste had prevented their easy entry into domestic work. Construction labour had been the option that they had rejected because "Who wants to work as a construction labourer? The supervisors treat you like their wives". They concluded that waste-picking was relatively more lucrative than domestic work, more "free" from sexual harassment and the servile feudal relationships in wage labour, that they had been subjected to in the villages. They had always been aware that secure jobs were hard to come by and also realised that we would not be able to fulfil this aspiration. Neither were waste-pickers interested in income generation programmes that could enable occupational change but also entailed a long, slow process of learning new skills and surviving in the market. They were interested in changing the terms and conditions of work in their present occupation. This understanding translated into KKPKPs perspective on scrap collection and the organisational strategies that derived from it.

Until that time the concerned waste-pickers had never foreseen a time when there would be no garbage on the streets. It had always been there and generations had lived off it. What they did know was that they had to contend with dogs, cats, cows and vermin when in the garbage bin; that the stench of putrefying garbage became an indivisible part of their olfactory

organ; that the metal and glass shards could cut their hands if they were not careful; that the scrap came to the bin already filtered by domestic workers and security guards who had taken the high value material; that the police rounded them up en masse when there was a theft in a neighbourhood; that municipal conservancy workers often asked them for "chai pani" (pin money); that citizens complained about the mess they made whilst sitting on the roadside to sort the scrap; that citizens saw them as "dirty, thieving scum of the earth"; that it was only the "malwari" (moneylender) who saw them as creditworthy; that the scrap trader arbitrarily fixed the purchase rates of scrap depending on how vociferous the waste-picker was; that the scrap trader would arbitrarily reduce the weights of the scrap claiming that it was dirty or moist; that the scrap trader was not going to give them a pension when they became too old to work; that their husbands suspected their fidelity and would be waiting to thrash them; that their children were ashamed to acknowledge their mothers' occupations; and above all that there would be no food in the house if they felt like taking a holiday. These constituted the critical issues as identified by the waste-pickers.

It is these critical issues that informed the process of organising and then sought to establish an alternate identity for waste-pickers as "workers" premised on the belief that scrap collection was socially relevant, economically productive and environmentally beneficial "work", and that the working conditions could be changed. The women from the group of thirty campaigned alongside the activists, convincing their colleagues that it was time to stand up, speak out and assert their rights. They had already learnt from their earlier experience that it had been their collective action that had resolved the problem. The formation of the KKPKP was a logical progression in the process of organising³⁵.

While most waste pickers in India grapple with similar issues, more recently there have been issues related to changes brought about because of the way cities see themselves growing and urban renewal policies that are not pro-poor focussed. I Delhi, many scrap shops were demolished or evicted as part of a ceiling drive against commercial operations on residential areas. Apart from this slums have been demolished and slum dwellers (including waste pickers) have been relocated far outside the city. Likewise in Pune, scrap shops have been omitted from the list of enterprises eligible for alternate space under the Slum Rehabilitation plan. The privatisation of waste collection models that exclude waste pickers also pose a threat to the livelihoods of waste pickers. In Ahmedabad for example, Reliance and ITC, two large

³⁵ This section taken from Chikarmane, P. and Narayan, L. Organising the Unorganised: Case study of the Kagad Kach Patra Kashtakari Panchayat, 2004

business conglomerates are making plans to get into door to door collection of waste with a view to tapping carbon credits.

Exclusionary urban renewal and exclusionary solid waste modernisation are the emerging critical issues in this century.

3.1.1 Integration efforts by Aakar, Mumbai

Aakar started working with workers engaged in cleaning work in 1996. The focus of its work shifted to include waste pickers in 2002 because they believed that they were the most vulnerable in the urban areas. Aakar has 3792 members (not all waste pickers) who pay an annual fee of 68 euro cents towards their identity cards. 378 waste pickers have been issued identity cards. Aakar has 9 trustees, 5 of whom play an active role in the organisation and four staff. Geographically, Aakar's work is confined to the western suburbs of Mumbai in about 9 out of 24 municipal wards. Aakar organised the waste pickers at the Gorai landfill until its closure about 5 years ago. Thereafter it has contact with waste pickers at the Mulund landfill who have yet to be formally enrolled as members.

Mr Milind Arondekar Founder President of Aakar told us of a survey they conducted of 2500 rag pickers to understand their overall socio-economic status and their problems and needs. He believes that the results of the survey will project valuable information for the civic bodies to base their services and future strategy on waste management.

According to Mr Arondekar, Aakar's efforts to integrate waste pickers have primarily been through contract arrangements with the MCGM. The first experience was of a Composite Road Sweeping and Garbage Collection Contract along the lines of the "Hyderababd Pattern"³⁶ Aakar was awarded the composite tender for cleaning 18 k.m. road and transporting solid waste collected through two of its groups of waste pickers. The work was carried out by 18 members and one supervisor, who were paid €51 and €68 respectively per month. In the second experience Aakar was contracted to collect organic and non biodegradable garbage from generators in four vehicles provided by the MCGM.

According to him the relationship of the organisation with the MCGM has been fraught with problems. In the sweeping contract the organisation Aakar made huge losses on account of penalty deducted for performance related

³⁶ MCGM attempted to replicate what was called the "Hyderabad Pattern" (after a successful experiment in Hyderabad city) of awarding cleaning contracts to NGOs and community based organisations on fixed output for fixed remuneration norms. The rate contract was fixed and bids were called for the geographical area to be covered.

complaints against the workers and the demands for bribes from Municipal Officers. Typically the degree of enforcement of contract norms is directly proportional to the bribes paid by the contracted party. In the subsequent contract, the payments from the MCGM were never received on time as a result of which Aakar had to advance the amount from its own resources to cover costs. This is a fairly common hazard in municipal contracts. The workers were paid €1.7 per day while the supervisor was paid €2. The service is likely to be terminated in the near future by the MCGM.

Aakar have had difficulties in its other non-MCGM linked endeavours as well. In 2003-2004 an attempt to organise garbage collection in the market area as part of the Chakachak Mumbai (Sparkling Mumbai) campaign of the MGGM through recovery of monthly user fees of 16 €cents per household and €1.7 for shops from willing users did not take off because of opposition to user fees from the Municipal Councillor.

Bombay Dyeing a leading corporate house in Mumbai supported Aakar to organise collection of recyclables at the Bandra Bus Terminus. Aakar engaged 18 waste pickers and 2 supervisors for the job with the idea that after the initial period of support, the income generated from the sale of waste would sustain the activity. Aakar suffered a loss in this too because the entrenched traders engaged in this activity did not allow the work's smooth functioning.

Aakar implements the Slum Adoption Scheme of the MCGM for which it has organised local groups of cleaning workers for door to door collection of garbage. As per the norms of the scheme, the MCGM pays 10 €cents per household per month and collectors recover 16 €cents per household per month as user fees.

Aakar have organised 40 SHGs from among their members that have benefited under the SJRY³⁷. The SHGs meet once every month and a meeting of all waste picker members is organised once in three months. Aakar have also formed their own Service Cooperatives³⁸ but have not as yet taken up any contracts through it. Aakar is a nodal agency for implementing the Janashree Bima Yojana³⁹.

³⁷ Swarnajayanti Shahari Rojgar Yojana (SJSRY) is the flagship programme of the Government of India for encouraging Self Help Groups (SHGs) and enterprise among urban slum dwellers. Loans for starting informal enterprises are given to the SHGs.

³⁸ Cooperatives that are set up for providing services

³⁹ Janashree Bima Yojana is a social insurance scheme of the Life Insurance Corporation of India. The objective of the scheme is to provide life insurance protection to the rural and urban poor persons below poverty line and marginally above the poverty line. The Nodal Agency for implementation is a State Government Department which is concerned with the welfare of any such vocation/occupation group/ Welfare Fund/ Society, Village Panchayat,NGO,Self-Help Group,etc. The premium under the scheme is \$3.4 per annum per member. 50% of the premium i.e. \$1.7 will be contributed by the member and/or Nodal Agency/State Government. Balance 50% will be borne by the Social Security Fund. The amounts payable by the insurer in the event of Death (other than by accident) of the member is \$Rs.508; in the event of death/total permanent disability due to accident is \$1271 and for Permanent partial disability, due to accident, the amount payable is \$636.

3.1.2 Integration efforts by Forum of Recyclers Communities and Environment (FORCE), Mumbai

Started in the year 2000, FORCE has a fluctuating membership of about 1200 of whom about 700-800 renew their membership annually. Each member pays an annual member ship fee of €1.5.

FORCE has promoted three cooperatives:

- a. Jai Force Sewa Sahkari sanstha⁴⁰ has 35 members and works primarily on MCGM contracts
- b. Force Sewa Sahkari Sanstha⁴¹ has 65-70 members and works on private corporate housekeeping and waste management contracts
- c. New Force Sewa Sahkari Sanstha 42 has 20 members. It is newly registered and still not very functional.

Door to door collection of waste

FORCE carries out door to door waste collection from about 800 buildings in H-West ward; 400 buildings in D ward, K-West ward and C ward. Citizens do not pay any user fee. The service is offered daily if citizens get convinced to give it to the waste pickers. Waste is supposed to be source segregated but it usually is not: Waste pickers transport the recyclables to the scrap store at their cost. A weekly collection service for recyclables in a vehicle provided by the MCGM is also carried out by FORCE.

Scrap stores and intermediate waste processing unit

FORCE has also been provided space for running four scrap stores by the MCGM. One is operated and managed by FORCE and is utilised by about 25-30 waste pickers. The others have been given out and are being managed by waste pickers who pay a monthly sum of Rs.2500 to the organisation.

A PET bottle shredding unit managed by FORCE also operates in the same premises. The machinery was provided by Coca Cola Limited. The arrangement with Coke was that the company would coordinate with the MCGM to persuade big hotels to give the PET waste to FORCE for shredding. The link up between the hotels and FORCE did not materialise. Some big dealers supply material to the shredding unit but it is not enough to run the machine all day.

⁴⁰ Name of cooperative 1

⁴¹ Name of cooperative 2

⁴² Name of cooperative 3

Nonetheless, Founder Poonam Huddar says the PET shredding enterprise makes a profit.

MCGM labour contracts

FORCE supplies labour to the MCGM through the tendering process. The labour rates are pre-fixed on the basis of minimum wages. Six labourers are provided in every compactor that is supposed to collect organic waste. Contracts are short term jobs of 69 days duration.

Housekeeping and waste management contracts

However, the efforts of FORCE to integrate waste pickers have not been linked only to the MCGM. FORCE has also taken up private waste management and housekeeping contracts for large corporate houses and housing complexes. Each contract involves sweeping, collection of waste internally with the help of hired vehicle, segregation of waste on site, composting, sale of dry recyclable waste and disposal of the non recyclable waste. FORCE retains 10 per cent of the value of each contract. Organic waste treatment is also part of these contracts and the organisation has tried different technological options. FORCE also provides consultancy services for composting of organic waste. It runs 17 composting sites where almost 2 metric tons of waste is composted daily.

Says Poonam Huddar founder of FORCE, an organic waste converter machine manufactured by Excel Industries was purchased by FORCE with a loan of Rs.5 lakhs from the ICICI Bank for processing 70-80 kgs. per day from 372 HH.

The operating cost of the machine is Rs.3/kg of organic waste. This includes the costs of water, electricity, culture, absorbent material (saw dust) and labour. This is a company-tested estimate and also confirmed by Force.

Even if the MCGM provides the organic waste no one is willing to pay the operational costs due to which the machine is under utilized. It is used for merely 2 hours a day.

A bio-gas plant sponsored by Mahindra and Mahindra Industries was set up in a slum in Kandivili. The gas was used for the kitchen of a single family. It functioned well till it was handled by FORCE but ran into problems when the community started managing it.

What is interesting about FORCE is that it claims to be completely market driven. Neither its activities nor its staff have been supported by donor agencies. It was not possible to get a clear idea of the economics because those who gave the information were not very forthcoming. However, it certainly seems to be sustaining given the fact that it is able to manage large corporate contracts and pay the workers higher than minimum wages.

3.1.3 Efforts at integration Stree Mukti Sanghatna/ Parisar Bhagini Vikas, Mumbai

Stree Mukti Sanghatna (SMS) is a very well known women's organisation in Maharashtra. Much of its early work was in the area of women's rights and cultural engagement towards that goal. Stree Mukti Sanghatna initiated work with waste pickers in 1999. Henceforth in this case study, when the organisation SMS is referred to, it refers only to its work with waste pickers. Parisar Bhagini Vikas (PBV) is a cooperative of waste pickers promoted by SMS.

In the initial years SMS organised waste pickers at the Deonar landfill. The issues were complex, not least being the entrenched financial arrangements between municipal workers at the landfill, vehicle drivers, municipal contractors and waste pickers for rights over the income from the sale of recyclable waste at the landfill. The issue of identity cards reduced the harassment of waste pickers somewhat but did not eliminate it. Mumbai is India's largest metropolis. Its financial prosperity fuelled by flourishing markets and booming businesses makes it fertile ground for criminal activity in every sector including waste collection and recycling.

Organic waste processing

SMSs engagement with organic waste processing dates back to the inception of its work with waste pickers consistent with its beliefs of "zero waste". Organisers of waste pickers tend to veer towards exploring the scrap market, often overlooking the relevance of organic waste processing in the total integration schema. SMSs consistent work in this area has brought in this valuable facet into organising waste pickers.

In 2000-01 the MCGM provided space at the landfill to Parisar Bhagini Vikas to establish a compost plant to process 5 metric tons of municipal solid waste per day. €1000 was also given by the MCGM towards mobilisation costs. Ten women ran it for two years and then stopped. The production was 500 kg of compost per day which was sold at €34 per tonne. The project made

good profits but there were many problems. The production was disturbed during the rains. Material was also stolen, no rules were followed at the open dumping site and no one could control theft. The compost plant has since been closed.

The MCGM also gave space and constructed bio-methanation plants at 2 sites, Shatabdi hospital and Kattalkhana⁴³ which are run by the SMS. Garbage from hotels is supplied to the plant by the MCGM. The handling capacity of each is 5000 kg per day but each handles only 3000 kg per day employing 10 women, because the garbage supplied is inadequate. SMS offered to do the collection but the MCGM refused. SMS had calculations to show they could handle at a nominal rate of less than 1€cent per kilo if PBV collected the waste but this was not acceptable to the MCGM. Sorting sheds have also been given adjacent to the plants. An official contract has been entered into with the MCGM under which SMS has to been given a grant of €678 per month since 2004. The instalments from the MCGM came in regularly for 2 years after the plant was commissioned. Thereafter SMS has not been paid regularly by the MCGM. The SMS has been running the plants from its own resources.

The two experiences described are those in which SMS entered into contractual arrangements with the MCGM. It has however successfully been running bio-methanation plants for private parties such as canteens and other commercial establishments on a contractual basis. Likewise, SMS also undertakes composting of waste for residential and commercial premises.

Comprehensive waste management contracts

SMS undertakes comprehensive waste management contracts that include housekeeping services, door to door collection of waste and organic waste processing. The contracts are executed by waste pickers. Currently SMS is in the process of transferring all the contracts to PBV. Since 1999, SMS has integrated 403 waste pickers who service 9173 households across Mumbai.

According to Shanta Sable, President of Parisar Bhagini Vikas integration is always preferable from a waste pickers' perspective. They get a steady income, regular hours of work, two paid holidays a month and in some cases even a Provident Fund account to which they contributed. Each had personal savings of €136, apart from credit and other group savings. Additionally they get sick leave and are covered for insurance and health costs. Most women are unwilling to get back to waste picking, once they have tried this kind of work.

They are happy with the new image that comes with this work. She however said that of late, women have been reluctant to get integrated because quantities of waste on the street are rising on account of globalisation. There is a trend of women wanting to go back into waste picking. She goes on to add though that the highest form of integration that waste pickers of SMS aspire to, is for employment with the MCGM. SMS has neither asked for it nor does it believe that it should be their demand.

Linkages to government schemes: Swarna Jayanti Shahri Rojgar Yojana (SJSRY)⁴⁴

SMS has also systematically and effectively used the SJSRY for integrating waste pickers. The structure through which the SJSRY is implemented is the Self-Help Group (SHG). All members of PBV are members of the SHGs and the groups are registered as savings groups under the scheme. There are totally 123 such groups with 10-12 members each.

Each group received a one time grant of € 169 per group of which 50% was kept in the group. The money was not disbursed individually but loaned to the individual members at an interest rate of 2% per month. The members need two guarantors for the loan. The balance of 50% has been kept in the PBV fund and used for central purposes such as lending to groups at 1.5% per month. Savings of €1 per month are to be deposited in a separate group account every month. The accounts for the Self Help Groups are maintained by PBV. PBV is working towards self sufficiency in 2 years. The difference in interest is used for administrative costs and distributed as dividend. So members get dividend from their own groups as well as from the central fund. The number of groups has been steadily increasing over the years. Meeting and training costs of €2 in the first year and €1.5 per person in subsequent years is also paid to PBV by the MCGM.

Vehicles provided by MCGM for collection of recyclables

Six vehicles for door to door collection of recyclables were given to SMS in 2003-4. They were run entirely by the MCGM which provided the fuel and the drivers. About 50-75 waste pickers were involved in this work. The vehicles were used to collect waste which was then segregated at a common collection point. Wet waste was deposited in MCGM garbage containers and the recyclable waste was retained for sale by the waste pickers. The women and the material travelled in the vehicle because that is what they had been

⁴⁴ Swarnajayanti Shahari Rojgar Yojana (SJSRY) is the flagship programme of the Government of India for encouraging Self Help Groups (SHGs) and enterprise among urban slum dwellers. Loans for starting informal enterprises are given to the SHGs.

used to with the scrap trader. PBV managed the supervision of wastepickers and the recyclables, directly. There was no interference from the MCGM or sanitation staff with whom they enjoyed a peaceful relationship. There were occasional differences over timings, punctuality, number of trips etc. but no major squabbles. In some wards women collected recyclables worth €340 per week in these vehicles. In a particular area of South Mumbai some waste pickers cornered all the benefits and did not allow PBV to interfere or to supervise. They even refused to give accurate figures. However, the other groups were quite cooperative. In the absence of a clear policy, the system is subject to the individual preferences of the official in charge of solid waste management. The facility was withdrawn some months ago but has been reinstituted recently.

Collection of hospital waste

About 35 women have been granted permission by the MCGM to collect non-bio-medical waste from hospitals. The scrap is sold directly to their own scrap dealers.

Collection of post consumer Tetra Pak waste

Tetra Pak is a multi-layered packaging product. Stung by early criticism that the packaging is not recyclable, Tetra Pak, a Swedish company, is going all out to establish its credentials as a responsible producer in respect of post consumer waste. The company has supported paper mills and plastic plants to develop technology for stripping the paper and plastic-aluminium into separate commodities. Initially, SMS was to supply 5 Metric Tons of post consumer Tetra Pak waste to paper mills for processing.

The introduction of the School Milk Programme⁴⁵ a month ago by the MCGM has meant that SMS can supply 2 metric tons of Tetra Pak waste every day to the paper factory. The MCGM had invited 1200 members (1 per school) from the SJSRY groups to undertake collect of Tetra Pak waste. This was too much to handle because the collection system covered other scrap as well. The MCGM was ready to pay €cent85 per day per school and €17 per day for a vehicle to transport the material. PBV expressed willingness to undertake collection only from 350-400 schools in 8 wards. Aakar collects from 3 wards. As per the arrangement with the MCGM, PBV is to be paid or the collection service and to later distribute it to the members. Members have been unwilling to provide

⁴⁵ Government scheme in which children in government schools are given milk in Tetra Pak cartons as part of a nutrition programme

the collection service because the rates are perceived to be low. PBV pays an additional amount of €cent85 per person to go to school daily. As of now, PBV has been paying the collectors. The transport costs are also currently being paid by PBV on the understanding that the MCGM will reimburse the expenditure incurred. The record of the MCGM in these matters cannot be said to be exemplary as has been brought out in the case studies.

Scrap stores

The MCGM has provided constructed space for three scrap stores measuring between 500-800 square feet each under the SJSRY for the use of waste pickers. Two are very well constructed. Parisar Bhagini Vikas has been given permission to actually undertake construction of the scrap stores as well. There was no legal provision for the allocation of such spaces in 2004 at the time that they were given. It was done by a supportive Addl. Municipal Commissioner of the MCGM. It was only in 2006 that the Maharashtra Non Biodegradable Garbage Control Act provided for the provision of such spaces.

About 10-25 women use the spaces in each ward. Some of them monopolise it. They get scrap in an MCGM vehicle acquired by Parisar Bhagini Vikas. They sort the scrap and a PBV supervises their work. The supervisory cost is borne with help of an external funding agency. One group does not even give proper accounts, but the others do. At another centre they bring their scrap in a vehicle, again given by the MCGM. They sort the scrap and a Parisar Bhagini⁴6 helps them sell it. The group covers the cost of the supervisor themselves through their earnings from the sale of scrap. PBV has given one group €1700 as capital because the group functions like an intermediary. The group buys recyclable scrap and then which is then resold to the PBV shop for a commission.

3.1.4 Kagad Kach Patra Kashtakari Panchayat-SWaCH, Pune

Within the KKPKP empowerment is understood to be a process in which the poor critically reflect upon their life situation, analyse it and experience a sense of confidence and self-worth through the building of a collective identity, and then exercise the power to make, influence or control decisions that affect their lives.

The larger vision in organising waste collectors is with a view to develop a sector specific collective organisation of unprotected and unrecognised waste-

⁴⁶ Parisar Bhagini: worker of Parisar Bhagini Vikas

pickers and itinerant buyers who are the poorest and the most marginalised among poor urban workers.

Our vision involves a holistic approach that encompasses struggle against all forms of injustice, inequality and exclusion in the social, economic and political spheres. This is based on the understanding that poverty is not only an economic issue but has social, cultural and political dimensions as well.

The vision also includes the use of a combination of mass struggle (mobilisation/struggle/agitation) and development activities (reconstruction/development of alternatives). This is based on the belief that development activities such as the credit and service co-operatives and the scrap store cannot challenge entrenched power structures but sustain the involvement of members for whom the costs of struggle are high.

Strategy:

The following conscious determinants have shaped strategies over the past 2 decades of work in terms of the organising structure:

- Registration of the KKPKP as a trade union as a first step in establishing waste-pickers as 'workers'
- Using organisational forms of trade union, cooperative or company but essentially all membership based organisations
- Relating with institutions of the State (municipalities, labour department, education department, social welfare department, police), using a mix of evidence based advocacy and engagement.
- Relating with scrap traders, other stakeholders, citizens, neighbourhood associations, NGOs, trade unions, women's organisations and other organisations working with the poor and networking with the same on issues of consensus
- Establishing credibility as a responsible, methodical and mature organisation. This credibility has been built on the basis of its peaceful and disciplined non-violent agitation methods (rallies, demonstrations, sit ins, courting arrest).
- Focus on social development activities such as credit provision, education and child labour in addition to work related economic issues.
- Adopting a broad-based democratic structure and functioning in work

The strategies have involved:

Mobilising around Economic Issues:

- 1. Establishing scrap collectors as "workers" and scrap collection as "work"
- 2. Seeking State recognition of scrap collectors as "workers" and scrap collection as work
- 3. Claiming State resources on the basis of State recognition
- 4. Integration of waste-pickers into the doorstep collection and management of urban solid waste

Mobilising around Social Issues like Child Labour and child marriage

Mobilising around political issues, by building and sustaining relationships with members, building the reflective and analytical capacities of members, encouraging self-representation through Street Theatre.

Achievements of KKPKP

- First sector specific mass organisation of scrap collectors in the country
- First organisation to pursue and receive municipal recognition and endorsement of identity cards of waste pickers in the country
- First and only organisation of waste pickers in the country to have secured Group Medical Insurance cover paid for by the municipality
- Savings linked Credit cooperative, Rs.5000000
- Cooperative scrap store in space provided gratis by the PCMC Annual turnover Rs.15,00,000/-
- Action against Child labour in waste picking- Compulsory enrolment of children in schools
- Successful lobbying for extension of Central Govt aided Pre-matric Scholarship for children of waste pickers
- Action against child marriage, Community wedding ceremonies of 18+

The **SWaCH** (Solid Waste Collection and Handling) Cooperative of wastepickers is planned as a professional service delivery organisation that is autonomous, but functions under the aegis of the PMC and is financially supported by it. (Structure of Cooperative, Functioning, Budget and GB resolution attached, Annexure II.5)

KKPKP members will comprise the majority membership of the cooperative. However, membership will also be open to:

- Non KKPKP waste pickers
- Doorstep collectors belonging to/members of other organisations
- Doorstep collectors who are not members of any organisation
- Urban poor desirous of undertaking doorstep collection work

Due to its majority membership, a senior KKPKP office holder is one of the *de facto* members of the Executive Committee of SWaCH.

KKPKP-Swach works on concepts and provides solutions and services that enable a completely de-centralised waste management system in the city of Pune. These solutions are driven by a hierarchical chain of "Recycling Points" from door to door collection of segregated waste to a chain of scrap shops that ensure guaranteed recycling and reprocessing:

- Door to Door Collection Daily, reliable, mixed waste collection from more than 1.5 L homes in Pune. Our workforce of more than 2000 ragpickers provide these services in most wards and kothis of PMC and PCMC.
- Community Level Recycling Points Swach workers manage the infrastructure used to temporarily store dry and wet garbage in a society, apartment complex or locality. This Recycling point infrastructure includes a sorting shed that is used to further segregate DRY waste into 10+ categories to be sent for further recycling or reprocessing.
- Wet Waste Handling Swach provides home and community level composting services. Our workers manage the community compost pits and ensure that well sorted, good quality home wet waste and garden waste is managed daily to ensure trouble free operation of the composting facility.
- Scrap Shops KKPKP-Swach runs scrap shops to ensure that rag-pickers get a good deal for the scrap that they collect. A major expansion plan to setup more than 10 next generation, aesthetic and functional scrap shops is currently being executed. These plans include mobile scrap shops to increase the efficiency of scrap collection and creating the ability to handle new kinds of scrap including eWaste.
- Advocacy & Strategic Solutions KKPKP-SWaCH continues to be the advocate of Decentralised Waste Management in the country. The

core team is responsible for influencing all conceptual, policy level and regulatory matters around Solid Waste Management. It has been a whistle-blower around many aspects of SWM policy in Pune and has been a guardian of the rights of rag-pickers and other workers of the unorganised sector.

3.1.5 Chintan Environmental and Research Group, Delhi 47

Chintan works in the National Capital Region of Delhi, which includes Delhi and 2 other states. Essentially, the organisation was imagined then as an entity that wanted to work with waste related issues as an entry point into these core concerns: urban poverty, environmental sustainability and environmental justice. If Chintan then had a single concrete plan in mind, it was to work with waste recyclers to help recycling become a more formal and legally recognised enterprise. The understanding, built on previous work with these issues, was that policy and the public must understand and acknowledge the work of the waste recyclers. In Chintan's mind, recyclers referred not only to reprocessors who melted and pulped down the trash, but those whose labour ensured that the waste reached such factories. These were people who picked up waste and sorted it, the scrap dealers who regularly bought it, itinerant buyers who purchased high value scrap, and traders of all kinds. Chintan wanted its work to be in partnership with these recyclers, not just about them.

Chintan, in partnership with both the Municipal Corporation of Delhi (MCD) and the New Delhi Municipal Council (NDMC) has taken up the work of door-to-door collection (DTDC) in many parts of East and New Delhi. It has organised more than 2500 waste recyclers in the NDMC area and around 12000 in MCD area. While not all are directly engaged in formal work linked with Chintan, some of them are directly engaged on account of 4 Memorandums of Understanding (MOUs) that have been signed with the NDMC In two MOUs, the NDMC has given Chintan few cycle rickshaws while in the other 2, Chintan and the waste pickers have combined their financial resources to procure such rickshaws. Besides this, the NDMC has facilitated better ease of work via its sanitary inspectors, has provided spaces for segregation, and has facilitated the waste pickers to access medical facilities and issued identity cards through Chintan. None of these initiatives have been created as funded projects but are based on sustainable enterprise models.

⁴⁷ The cases of Delhi and Pune are from from Chikarmane, P., Chaturvedi, B., Narayan, L. Recycling Livelihoods: integrating the informal sector in solid waste management in India, GTZ, 2008

Working with Chintan, and partly funding the work, compelled the NDMC to look into institutional obstructions that involved them. The Medical Officer of Health (MOH), also responsible for waste management, was compelled to listen to the waste pickers' complaints, giving a new kind of legitimacy to the waste pickers, itinerant buyers and junk dealers. In just a few months, forced labour by municipal officials, bribes and verbal abuse were all substantially reduced.

Initially, on account of a legal reading of the Supreme Court guideline of DTDC, the NDMC forbade Chintan to collect service fees. Instead, it was expected to collect only the waste. However, this was not a financially viable enough model and therefore, the waste pickers appealed to the residents for a contribution towards a cup of tea each month. A 2008 study shows that from the average income has increased from 42-51 Euros per month to 90-97 Euros per month. This is on account of payments, legitimate work and savings of bribes usually paid, as well as access to cleaner waste at the doorstep. A door-to-door waste collector himself, who is paid by the contribution of the waste pickers themselves, monitors the project. The waste picker, Santraj Maurya, is seated in the Chintan office and trained by Chintan staff to monitor performance.

Santraj Maurya, himself a former waste picker from a backward caste, says that in a survey, the residents claim that after the formal DTDC has begun, not only has the cleanliness in the area increased, but people now dispose waste everyday, compared to the earlier situation, when some of the residents would dispose it only once in two or three days, as local dumping points (dalaos) are located far away. Some residents and local police claim that this system has also increased the security in the area, because it is now clear who is responsible for waste handling. As a part of this system, some traditional waste collectors, particularly women, were also re-trained and assimilated.

Another service is housekeeping, where waste pickers are trained to undertake both complex work and social skills. The single biggest challenge in this case is the contracting system. The contacting system is based on awarding contracts to the lowest bidder. There are no preconditions related to minimum wages, social security etc. Therefore, Chintan has often lost contracts, as the waste pickers do not find it viable to service a contract where they earn neither minimum wages not social security. Unfortunately, after losing contracts, several waste pickers also end up working at appalling wages in the hope of accessing more waste and an increase in payment in the future. It is essential

that contracts for waste demand higher social responsibility and do not merely award contracts to the lowest bidder.

3.2 Thailand

Wongpanit Company,48 Phitsanulok

This case study documents a market driven model that operates in Phitsanulok in Thailand that is supported by the GTZ and the Municipality of Phitsanulok in Thailand. Wongpanit is a company started by Somthai Wongcharoen⁴⁹ who 26 years ago used to move around in a small car to buy recyclables or to collect recyclables from children in exchange for candies.

Today Wongpanit buys from people what they have collected in their households, from itinerant waste buyers, waste pickers and various levels of small and medium traders. Prices are indicated openly and fliers with the prices listed are distributed in big shopping malls once a month. The company has 6 branches located at all the major junctions of the city that has a population of 200000 and generating about 140 tonnes of waste per day. By 2005, Wongpanit had over 180 franchisees and the cost recovery rose from 5 % to 45 %. The company offers small and medium suppliers the chance to become part of his company by becoming a franchisee for a small fee and to avail of the training provided by the company.

The Phitsanulok Municipality provides two types of waste collection services, door to door and communal waste bins placed on the roadside which is the more common form. Resident families separate the valuable waste and sell to itinerant waste buyers or small dealers. The waste pickers are allowed to collect from the waste bins and are also provided training on how to protect themselves by the municipality.

Separation of waste occurs at four levels—in the households, on the street by waste pickers, by the municipal collection crew and at the landfill. The Wongpanit Company runs a separate collection station for the municipal crew. According to Spies (see below), there are only about 15 waste pickers who have been provided gloves and protective gear the landfill because most of the recyclables have been retrieved prior to that. The Wongpanit Company has been growing at around 10 % a year and provides training to fresh entrepreneurs on payment of a fee.

⁴⁸ Spies, S. and Wehenpohl, G. The informal sector in solid waste management-efficient part of a system or marginal and disturbing way of survival for the poor, paper presented at the CWG-WASH Workshop, Kolkata, Feb 1-6, 2006 49 Foppes, N. Wongpanit: a successful waste recycling business in Phitsanulok, Ayamuong, RISE-AT, 2000

Category of worker	Methods of work	Material
Street pickers	Recovery	Bottles, cans
Landfil waste pickers	Recovery	Bottles, paper, plastic bags, cans, other valuables
Collection crews	Recovery (en route)	Bottles, cardboard, cans, valuables
Itinerant buyers	Door to door buying (announced collector)	Cardboard, plastic bottles, glass bottles, aluminium cans
Dealers, neighbourhood dealers or buyers	Buying (retail)	Metal, iron, steel, paper, cardboard, plastic bottles, glass bottles, miscellaneous
Small-scale entrepreneurs	Buying, trading	
Large-scale entrepreneurs	Buying and large-scale processing technology	

Table 1: Certain materials are interesting for different types of workers, source:(3)

The Wongpanit Company is an example of a market driven organisation model. There are other forms of waste picker's organisations in Thailand. Some of these are listed below.

1. Family headed enterprises

In Kamphaengphet provinces, there are six organisations namely Uncle Toe group, Uncle Ngern Group, Aung Lerm group, Aunt Juan group, Mr. Chala's group, Uncle Wech group.

- 2. Organisations of workers that are headed by village chiefs and are registered with the municipality in urban areas They are:
 - a. Green Ant group with 50 members in Ban Kamsing community, Muang District, Kamphaengphet Province.
 - b. In Ubonrachatani Province, there was an organisation taken cared of by the Village Chief in Ban Keng community with about fifty members. Currently, they moved to Warinchamrap District.
 - c. In Phitsanulok Province, there are thirty members in Ban Kok community's waste collecting workers' groups. In the close-by community, they also have a news center (covering area of Nakhorn-Phitsanulok municipal) covering Moo 2 and Moo 11 area with about ten members.

- 3. In Phuket Province, the waste collecting workers are the locals who live near the Phuket municipal landfill sites. They call themselves "Saphan Hin community". The members of the group have close relationships.
- 4. The organisations of migrants who live near the landfill site.
 - a. In Rayong Province, most waste collecting workers are from Phichit Province. The Rayong municipality takes care of them. They have about forty members.
 - b. In Samutprakarn Province, most workers are from Srisaket or Ubonrachatani Province. The Bang Pla Tambon Administrative Organisation takes care of them. Thereafter, a private company was given the concession to deal with the landfill that has about 100 Rai area of land. There are thirty families of workers or around 80-90 people in the area.

The organisations of the waste collecting workers come together naturally as networks of relatives or families. Their strengths usually depend on the family functions.

Although in some cases, the leaders of the groups are the owners of the landfills or officials as in the case of Samutprakarn, Phitsanulok, or Ubonrachatani (where the village chief is the leader); however those leaders are not accepted in some provinces because they are not the genuine representatives of the groups. Therefore, the strength of the groups remains upon the quality and leadership characteristics of the leaders.

The organisations of workers that are based on the area, the relationship between the members and the networks are not as closely-knitted as the one explains earlier as this relationship is mostly business-oriented. For example, this would refer to the relationship of waste collecting workers with the buyers of antique products.

3.3 Philippines

The earliest studies conducted in Metro Manila in the early 1970's estimated that around 2500 families supported themselves by scavenging. Filipino authorities were hostile to scavengers and scavenging was banned. Martial law enforced police action against scavengers in 1974, included impounding and burning of scavenger carts, dismantling of warehouses for scrap materials and arrest,

fining and detainment of scavengers. Scavengers continued to work despite the ban albeit with lower earnings and more vulnerable conditions.⁵⁰

There was a bit of a thaw in the 1980s and the Cash for Trash programme mooted by some citizens was promoted by the government. It has been described in the section on organisation and integration.

Government supported Cash for Trash Programme

According to Lapid⁵¹, in the 1980s there was growing realisation that waste pickers (he refers to them as scavengers) were an integral part of the junk shops-recycling network. The programmes initiated in Metro Manila in the Philippines in the 1980's were focussed on strengthening junk dealers and itinerant waste buyers. Lapid critiques the Cash for Trash programme that was put forth by some citizens that had a very short life. The plan was to implement a waste separation and resource recovery programme supported by some Ministers for which an investment of a budget of P 1.8 million (approximately US\$200,000) to fund the Program was made.

The original plan had been to use the existing informal system of recovery as the cornerstone to implement the programme. During the implementation the plan was modified. In 1982, the Metro Manila authorities instead of using the informal system of resource recovery developed a parallel system to compete with the informal system, expecting to profit from it. Eco-aides were sent around to collect the recyclables. The Pera sa Basura (Cash for Trash in Tagalog, the Philippino language) and the programme created a new structure of junk shops or buy back centres sanctioned by the government for recyclables collected by itinerant waste buyers and waste pickers. A single recycling corporation was established to buy all the recyclables from the 30 eco-centres (junk shops) that were subsequently established. Barely two years later all the eco-centres closed shop. Another programme, Kwarta sa Basura (Tagalog for Money from Waste) started in 1986 with the same objectives and strategies failed yet again. The programme tried to compete with and replace the informal system. Analysts were in agreement that the primary cause of failure was the adverse reaction of the existing informal system of junk dealers, to the project.

Implementers of the aborted project had failed to give importance to the role of the informal system in the recycling of waste materials. As a result, the junkshop dealers felt threatened by the establishment of the project because

⁵⁰ Keyes, W. Manila scavengers: The struggle for urban survival, IPC Poverty research series, 1974

⁵¹ Lapid, D. Supporting and strengthening junk dealers and recyclers. Centre for advanced Philippine studies, WEDC Conference, Sri Lanka 1994

they were left out of it. The dealers saw to it that the eco-aides sold their collection of waste materials to them by giving these eco-aides better prices than the buying prices of eco-centers. The eco-aides then returned to the eco-centers declaring that they failed to buy anything. Some dealers that were interviewed also attributed the collapse of the program to the alleged graft committed in the procurement of fixed assets for the eco-centers. Eco-aides were provided overpriced pushcarts, overpriced weighing scales, overpriced warehouses, etc. These purchases led to the depletion of the seed capital needed by the eco-aides to buy the waste materials. Overall, the collapse of the project could be traced to the failure of the program to integrate or include the informal sector into its program hence the kind of reaction and competition that it had not bargained for.

Private initiatives by NGOs

1. Linis Ganda

In 1983, the Metro Manila Women's Balikatan (meaning "shoulder to shoulder" in Tagalog) Movement of the Philippines started organising existing junkshop dealers in San Juan, Metro Manila using the original concept of the CASH-FOR-TRASH program, that is, to buy recyclable items as part of their aim to protect the environment. It took advantage of the previous system of itinerant buying and scavenging and was willing to work with the government to protect the environment. The Balikatan campaigned for waste separation at the household level, started to organise the junk shops in a Metro Manila municipality and link them with residential communities to make the collection of recyclables more efficient. Linis Ganda as the programme is called is Tagalog for "clean and beautiful". It acted as guarantor in behalf of the junkshops so lending institutions would provide them some credit for working capital. It also popularised the term 'Eco Aide' to refer to scavengers and pushcart collectors, thereby highlighting their role in ecological care. The Balikatan also made arrangements with home owners associations for the entry of collectors in to gated communities on fixed days of the week.

At the start of the project, Balikatan got the cooperation of the municipal government of San Juan. Upon instruction from the Mayor, community assemblies were convened in each of the 21 barangays (local districts) of San Juan to explain the concept of solid waste separation and the benefits that it will give to the households. Discussions were held on how to increase solid waste recovery. Permission was obtained from the government water

utility company for the use of one of its vacant lots as a junkyard or collection center. Now, Balikatan operates in other municipalities of Metro Manila. The group has started to organise the junkshops into cooperatives to avail of government subsidies and credit and enable them to get better deals with bigger junkshops and recyclers and even formal institutions. Balikatan facilitated loans to junk dealers and discussed with users of waste materials the recycling of newer forms of waste.

Through the intercession of Balikatan and other groups, other government support has started to pour in. The Department of Trade and Industry is in the process of approving a P250,000.00 (US\$9,000) soft loan package for Eco-Aides to be used as working capital in their daily chores of buying recyclables from households. Recently, the Department of Social Welfare and Development field office in Region 3 released the P100,000-livelihood financial assistance to a group of Eco-aides as seed capital for income-generating projects.

The Linis Ganda programme established a network of itinerant collectors called eco-aides who were provided with id cards, green T shirts and green push carts. There were two kinds of eco-aides, land-based who roamed the streets to buy small quantities of waste and collect from the garbage bins on the streets on fixed routes. There were also river-based eco-aides who collected recyclables in single person boats called bancas on the San Juan river. Women comprise 30% of the 100000 eco-aides in the San Juan river. They earn higher incomes during the rainy season because strong streams wash away more materials. Linis Ganda has undergone rapid growth. Today there are cooperatives in each of the 17 cities and towns that comprise Metro Manila⁵². The cooperatives include 897 middlemen, each of whom works with several eco-aides. The coops can avail of loans from the Philippine Department of Trade and Industry and from the Land Bank. Linis Ganda also plans to start bio-gas and bio-gas operations.

Linis Ganda is an initiative that has some scale. Its 2000 eco-aides collect 15000 metric tonnes of source separated recyclables from about 300000 households in Metro Manila every month. This constitutes about 20 % of the Metros population. The Eco-aides visit households and schools about once a fortnight. Their average income ranges from PHP 50 to 500 per day. In 2004 they earned PHP 268 million (US\$10M) from 210000 tonnes of recyclables. The programme recycles nearly 10 % of the wastes generated in Metro Manila at no cost to the government.

Other NGOs have joined in. The Ayala Foundation, Inc. wants to campaign for thechange of name of junk dealers to 'waste managers'. Waste separation from the source is now becoming a popular campaign of many NGOs specially the Recycling Movement of the Philippines and the Ecology Center through their community-based Zero-Waste Campaigns. Business and civic organisations, like the Rotary Club, are also willing donors to community based waste management drives.

Besides Linis Ganda, large numbers of independent collectors work in he areas of Metro Manila with their own push carts or boats or working capital. They are not associated with any group, are not organised and have no fixed route. Estimates of their numbers or the quantities they recover do not exist. However, according to Medina's observations the number of such autonomous collectors is higher than that of eco-aides. Many independent collectors do not have push carts; instead they use plastic bags to store retrieved items. Opportunities exist for these independent collectors to be incorporated into formal programs like Linis Ganda.

While Linis Ganda is a successful venture in most respects in as far as the collection and trade of saleable recyclables is concerned. In organising itinerant waste buyers and junk shop owners and legitimising almost 2000 of them, it has also brought them recognition and dignity. Having said this, it cannot be forgotten that in every city where they exist, the itinerant buyers collect the cream of the recyclables, the bottles, the newspapers, the plastic containers and jars and ferrous and other metals. It is important to note that large quantities of waste that do not have a definable identity and low value like scraps of paper, torn plastic bags, bits of metal scrap continue to be disposed as mixed waste in Metro Manila. The eco-aides do not recover this material. It is recovered by the paleros (collection crew in the collection vehicles) and sold. What passes through the filtering by the paleros is then collected by the waste pickers at Pier 18, Payatas and other landfills.

Ms Leonarda Camacho, the leader of the Linis Ganda and the mover of the programme, had this to say when asked if any attempt had been made to include waste pickers in the collection programme, "no no, the scavengers are nimble fingered thieves. They cay not be trained. They are dirty, the households will never entertain them." ⁵³ While this is not meant to undermine the value of what Ms Camacho and Linis Ganda have managed to achieve, it must be mentioned here that scavenging and scavengers still continue to eke out a living in Metro Manila, albeit far away amidst the garbage at the

landfill. The next section covers the unsuccessful attempts to resettle waste pickers and that is the challenge that the Filipinos and the government need to address.

2. The Smokey Mountain saga

Smokey Mountain was quite literally a mountain that came into existence as a result of unplanned waste dumping over a period of 40 years on an island in the Philippines. The gas emissions and the resultant fires caused a pall of smoke over the area giving it the name Smokey Mountain. Shanty towns of recent migrants with no other means of livelihood developed around the dump. The incoming waste was not enough to sustanin the needs of the growing population and the garbage wars that ensued were regulated by a Catholic priest who negotiated a shift system for scavenging among the warring factions.⁵⁴ Waste dumping at Smokey Mountain was suspended in 1995 and the homes of waste collectors were demolished to construct buildings with the intention providing them improved homes, According to Manney Calonzo⁵⁵, the Smokey Mountain residents were not taken into confidence either prior to or during the process. The project that was meant to improve the living conditions of the waste pickers at Smokey Mountain actually had a deleterious effect because they were left with no source of livelihood and did not have the skills or capital to enter the job market.

The waste pickers simply moved to the Payatas dumpsite where waste dumping had commenced. Over 400 hundred waste pickers lost their lives when they were buried under 2000 tons of garbage when a 60 foot tall mountain of garbage came crashing down on them during the rains in an accident at the Payatas dump in 2000. This accident shamed the government and compelled it to enact Republic Act 9003 in the year 2000. The Asian Development Bank donated \$1.8 M to implement the Act.

4. Legal Provisions

In this chapter we review all the laws, rules and regulations pertaining to solid waste management as they relate to the waste informal sector in India, Thailand and the Philipppines. The statutes provide the enabling framework for integrating the informal sector in solid waste management. For the most part the framework in India is enabling although not explicit for the most part, in making provisions for incorporating the informal sector in solid waste

management. The salient features of the laws are set out and the implications examined in the context of this study.

4.1 India56

Introduction

Among the Indian States, Maharashtra, and among the Municipalities, the Pune Municipal Corporation, have been progressive and inclusive in their approach. In large measure, this has to do with the long standing large scale organisation of waste pickers in Pune and Mumbai backed by research and data to support integration. Existing laws often provide spaces in which initiatives for the informal sector can be taken. These become precedents which later can get codified into law.

India has a federal structure with the Central Government at the helm followed by State Governments of the constituent states and institutions of local governance such as the Panchayats in rural areas and the Urban Local Bodies in urban areas. Urban Local Bodies according to their size may be Municipal Councils (small) or Municipal Corporations (large). The Constitution defines the jurisdiction of the governments at each level. Some matters pertain to what is called the concurrent list on which both the Centre and the State can legislate. The laws enacted by the Central Government are adopted by the States. Urban development is what is referred to as a State subject and the State government is at liberty to enact and amend laws on the subject within the broadly defined parameters of the Constitution and the laws enacted by the Central Government.

4.1.1 The Constitution of India and Central Legislations

The Constitution of India provides the overarching framework for solid waste management as well as environment protection. Article 243 (W) of the Constitution of India specifies the powers, authority and responsibility of the Municipalities. The Article provides for the State government to empower Municipalities to carry out the functions listed in the Twelfth Schedule of the Constitution. The functions that are relevant to the informal sector in solid waste management are Public health, sanitation conservancy and solid waste management (No.6) Urban forestry, protection of the environment and promotion of ecological aspects (No.8), Safeguarding the interests of weaker sections of society (No.9) Urban poverty alleviation (No.11)

⁵⁶ The India part is taken from Chikarmane, P., Chaturvedi, B., Narayan, L. Recycling Livelihoods: integrating the informal sector in solid waste management in India, GTZ, 2008

Article 51(A) part 4A of the Indian Constitution has identified 'protection and improvement' of the environment as fundamental duty of citizens. Hence, the citizens must co-operate with the Urban Local Bodies to protect the environment. After a series of petitions filed by individuals and organisations, the Supreme Court rulings have included 'clean and green environment' in Article 21 (Protection of Life and Personal Liberty) of the Indian Constitution.

The present legislative framework is broadly contained in the Environment Protection Act, 1986; the Water Prevention and Control of Pollution Act, 1974 and the Air (Prevention and Control of Pollution) Act, 1981. The Environment Protection Act of 1986 is the umbrella Act that pertains to the management of solid waste. Solid waste management including collection, transport and disposal was required to be carried out by the Municipalities under the respective Municipal Acts. There were no other rules and regulations prescribed till the Hon. Supreme Court of India issued directives to the Government regarding the framing of rules because citizens started approaching the courts for relief in these matters.

In the year 2000, the Municipal Solid Waste (Collection and Handling) Rules (henceforth referred to as MSW rules) under the above Act, came into effect. The rules not only acknowledge the importance of waste segregation and recycling, but also mandate that these must occur. They emphasise the importance of technology, monitoring, and conformance to standards in SWM. Recycling is described as the process of transforming segregated solid wastes into raw materials for producing new products, which may or may not be similar to original products. The legislation also allows for incineration and pelletisation with or without energy recovery to be labelled as recycling. Despite the vital role of the informal sector in segregation and recycling of solid waste, the legislation is conspicuously silent on any mention of the informal sector.

The MSW Rules are not prescriptive but offer a range of non-hierarchical options that individual municipalities can choose from. Given the complexity of municipal decision making processes, the non-directiveness of the rules are both a boon and a bane. For example, the Rules urge segregation and recycling but fail to expressly acknowledge that the informal sector actors already undertake these activities in efficient and cost-effective ways. By allowing the use of technologies such as incineration, the Rules unwittingly promote the displacement of waste pickers and waste handlers in the informal sector, since incinerators compete with these workers for waste

of high calorific value⁵⁷. Similarly, the emphasis on privatised door-to-door collection of household garbage is a double-edged sword: on the one hand, it provides a window of opportunity to waste pickers to become the private actors who undertake door-to-door collection; on the other hand, it allows for Municipalities to outsource this task to large corporate players, thereby displacing the waste pickers and exacerbating urban poverty and inequity. Ultimately, the Rules fail to connect Solid Waste Management policy to existing good practices such as segregation and recycling by informal sector actors.

Thereafter, the Government of India also brought out a slew of regulations⁵⁸ on other types of waste such as plastics (particularly plastic bags) and hazardous waste like batteries. Some of these related to the import of plastic waste from other countries for processing in the recycling markets and industries in India. There was growing recognition in policy circles that informal sector actors were necessary to urban recycling, although it was grudging and failed to address the informal sector's own needs.

A Manual on Municipal Solid Waste Management, 2000⁵⁹ was prepared by an Expert Committee constituted by the Ministry of Urban Development and Poverty Alleviation, Government of India, after considerable deliberation. While not a policy directive, it is the first document of its kind and has been extensively used by Urban Local Bodies across India. The manual focuses on operational issues. It recommends recovery, sorting and recycling of materials such as glass, paper and metal, for an economically and environmentally sustainable waste management system. In Section 10.7.7 titled Collection of Duly Segregated Recyclable and Non Biodegradable Waste from Households, it is specifically mentioned that waste pickers should be organised; recognised through issue of identity cards; provided bags and tools and allotted the work of door to door collection of waste through NGOs. The manual designates recycling as next only to waste reduction as a waste management option.

58 S.O.432(E), (16/5/2001) - The Batteries (Management and Handling) Rules, 2001

Hazardous Wastes (Management and Handling) Amendment Rules, 2000

S.O.705(E), (2/9/1999) - The Recycled Plastics Manufacture and Usage Rules, 1999

S.O.698(E), (17/6/2003) - The Recycled Plastics Manufacture and Usage (Amendment) Rules, 2003

Bio-Medical Waste (Management and Handling) (Amendment) Rules, 2003

The Hazardous Wastes (Management and Handling) Rules, Draft (2007)

Maharashtra Plastic Carry bags (Manufacture and Usage) Rules, 03 March 2006

Attention is invited to Public Notice No.392 (PN)/92-97 dated 1.1.1997 according to which import of Plastic Waste/Scrap (except PET Bottle Waste/Scrap) and animal dung or animal excreta shall not, be permitted, except against a license.

59 Manual on Municipal Solid Waste Management published by Central Public Health & Environmental Engineering Organisation, Ministry of Urban Development, Government of India, 2000 http://cpheeo.nic.in/

⁵⁷ Waste of high calorific value means waste that burns easily like paper and plastic emitting high heat in the process

National Environment Policy passed in 2006⁶⁰ contains clauses pertaining to the informal sector that refer to: developing private-public partnerships on payments by users, cleaning up pre-existing toxic/hazardous waste dumps, strengthening capacities of local bodies for segregation recycling and giving legal recognition to informal sector systems.

4.1.2 State Legislation

Among the Indian states the Government of Maharashtra has been fairly responsive to the inclusion of waste pickers. This has largely been on account of the presence of mass organisation of waste pickers in Pune and Mumbai and other cities. State government resolutions are important decisions or government orders. Quite often they are executable instruments that stem from laws and regulations. In 199961 the Maharashtra Government issued an order to Municipalities directing them to issue identity cards to waste pickers. This was followed by another order in 200262 directing municipalities to allot the work of collecting waste from homes, shops and market places to organisations and cooperatives of waste pickers and to initiate such organisations where they did not exist.

The crisis caused by the Mumbai floods in 2005 spurred the Government of Maharashtra into passing the Maharashtra Non-biodegradable Garbage (Control) Ordinance, 200663 for regulating handling of non-biodegradable waste. The Ordinance was converted into an Act soon after. (See Annexure II.2 and II.3 for details) The first of its kind in India, this law relating to the collection, handling and disposal of non-biodegradable waste is explicit in setting out the responsibilities of various stakeholders including citizens. It acknowledges the value of recycling and waste pickers. The Rules framed to implement the Act provides for recycling sheds to be allotted to waste pickers.

Pursuant to the Act the Government of Maharashtra issued Government Order of 2006⁶⁴ framing an exhaustive Action Plan for the Implementation of the MSW Rules 2000 in municipalities. The plan favours not only integration of the informal sector but also sets out comprehensive guidelines for integrated solid waste management. Maharashtra State legislation is a particularly forward-

⁶⁰ National Environment Policy, Government of India, 2006 http://envfor.nic.in/nep/nep2006e.pdf

⁶¹ Government of Maharashtra, Water Supply and Sanitation Department, Government Resolution No. Ghakavya-1099/ Pra Kra 314/ Papu-22 Dated: 6, April 1999

⁶² Government of Maharashtra, Water Supply and Sanitation Department, Government Resolution No: Ghakavya 1001/ Pra. Kra 546/ Papu-22 Date:5 January, 2002 (see Annexure II.1 for details)

⁶³ Maharashtra Non-biodegradable Garbage (Control) Ordinance, 2006 (See Annexure II.2. for details)

Maharashtra Non-biodegradable Solid Wastes (proper and scientific collection, sorting and disposal in the areas of the municipal corporation) Rules 2006 (See Annexure II.3. for details)

⁶⁴ Government of Maharashtra, Urban Development Department, Resolution No. SWM 1006/CR53/UD-16 dated 25 October 2006 (See Annexure II.4. for details)

looking policy in terms of creating an enabling environment for informal sector waste recyclers. Whether, it has been emulated by any other State till date, is not known.

4.1.3 Municipal Laws

Municipalities in India are subject to the different municipal laws under which they have been constituted. Mumbai and Pune for example have been constituted under the Mumbai Municipal Corporation Act, 1888 and the Bombay Provincial Municipal Corporation (BPMC) Act, 1949 respectively. The enactment of Central or State legislation in respect of matters within the purview of the urban local body does not automatically translate into implementation. The local body is required to frame its own rules for compliance and penalties for non-compliance. The ensuing gap between legal provisions, policy and practice is often the cause for delay and non-implementation. In respect of the functions of the Corporation, a distinction has been made between those that are Obligatory and those that are Discretionary. SWM is identified as obligatory duty. While the Acts and Rules passed by the Central and State governments apply to Municipalities they have to be adopted by the urban local body in order to be implemented.

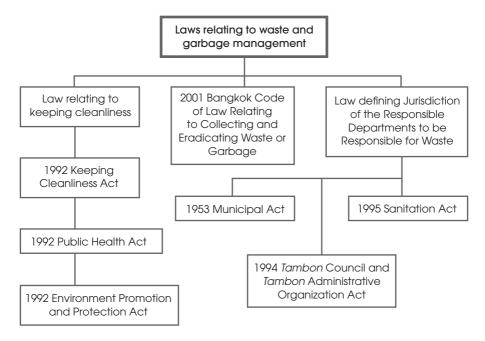
The Greater Mumbai Cleanliness and Sanitation Bye-Laws passed by the Municipal General Body⁶⁵ in 2006 enforce waste segregation and allow for allotting dry waste sorting centres to registered cooperative societies of waste pickers or any other agents.

In February 2007, the Pune Municipal Corporation General Body Resolution No. 476% approved the formation of and support to the constitution of a central cooperative- that would integrate waste pickers into the door to door collection of solid waste. While the dynamics in respect of this decision will be described in the next chapter on integration, the salient features of the docket (unofficial translation) are spelt out in Annexure II.5. In 1995-96 the Pune Municipal Corporation had been the first municipality in the country to endorse the identity cards of waste pickers; later in 2002 it was again a pioneer in providing medical insurance cover to all registered waste pickers in the city and in 2007 the PMC once again made history by resolving to support an integration model outside the contracting framework. The General Body Resolution in Pune was preceded by a pilot to scale that drew legitimacy from authorisation given by the Municipal Commissioner using his powers under the BPMC Act.

⁶⁵ Greater Mumbai Cleanliness and Sanitation Bye-Laws were passed by the Municipal General Body in 2006 http://www.mcgm.gov.in/irj/portal/anonymous/qlblaw

⁶⁶ Please see Annexure II.5. for Unofficial translation of Pune Municipal Corporation General Body Resolution Number 476 dated 22 Feb 2007 for forming and supporting a cooperative of waste pickers

4.2 Thailand



Enhancement and Conservation of National Environmental Quality Act, B.E. 2535

- Water Quality Standards
- Solid Waste, Night soil and Hazardous Waste Management
- Toxic Substance Legislation

4.3 Philippines

As in India, the Philippines had laws that touched upon SWM since 1938, but they were pieces of legislation that dealt with one or other aspect. The Anti Dumping Law of 1938, the Garbage Disposal Law of 1975, the Sanitation Code of 1975 and the Local Government Code of 1991 specifically address the subject of solid waste disposal. The Marine Pollution Control Decree of 1976 and the Toxic substances and Hazardous and Nuclear Waste Control Act of

1990 focus on specific wastes. The two most recent landmark laws that pertain to solid waste management are RA 8749 the Clean Air Act of 1999 that bans all types of incineration of wastes and RA 9003 the Ecological Solid Waste Management Act of 2000.

The Clean Air Act RA 8749 got many accolades for the Philippine government because it banned the use of incinerator based technologies that emitted toxic fumes. The Act calls for the use of "state of the art, environmentally sound and safe, non-burn technologies". Although at the time only medical waste was incinerated, the Act allowed for a period of 3 years during which even medical incinerators were required to be phased out. Local governments and politicians find the Act cumbersome and tedious because it forecloses their easy option for processing waste since land for landfills is in short supply. The Act remains despite demands for its repeal by this group.

4.3.1 Philippines Republic Act 9003: Year 2000, Approved in January 2001

An Act providing for an Ecological Solid Waste Management Program, creating the necessary institutional mechanisms and incentives, declaring certain acts prohibited and providing penalties, appropriating funds therefore, and for other purposes. Section 17. The Components of the Local Government Solid Waste Management Plan includes, but is not limited to:

- a. City or Municipal Profile estimated population; map of city/municipality; estimated solid waste generation, by source; waste disposal inventory
- b. Waste characterisation
- c. Collection and transfer
- d. Processing
- e. Source Reduction
- f. Recycling
- g. Composting
- h. Solid waste facility capacity and final disposal
- i. Education and public information
- j. Special waste
- k. Resource requirement and funding
- I. Privatisation of solid waste management projects
- m. Incentive programs

Republic Act 9003 of 2000 is a comprehensive legislation that addresses issues within the solid waste management process viz. collection, storage, transport, processing and disposal. The passage of RA 9003 was long fought by an alliance of NGOs that included the Recycling Movement of the Philippines, the Earth Day Network, Mother Earth, *Linis Ganda*⁶⁷, Concerned Citizens Against Pollution and Greenpeace Philippines. The Act has been implemented in parts because the requirements are not in keeping with ground realities. For instance the law states that sanitary landfills will replace open dumping within five years. Five years later less than 10 % of the replacement had actually been carried out because sanitary landfilling costs 40 times more than open dumping and the government simply does not have the resources to pump in to this (PCI 1998).

Key Provisions of Republic Act 9003, Ecological Solid Waste Management Act⁶⁸.

- It established the Solid waste Management Commission.
 The Commission will include representatives of all levels of government and public sector including one NGO. The NSWMC will oversee the implementation of SWM plans and prescribe policies to achieve the objectives of RA 9003.
- 2. It creates the National Ecology Centre
 The centre will function under the NSWMC and will provide consulting,
 training, networking and information services for the implementation of
 RA 9003
- 3. It defines the role of the LGUs in solid waste management LGUs will be primarily responsible for the implementation and enforcement of the provisions of RA 9003 within their jurisdictions. Segregation and recycling will be mandatory at Barangay (community) level.
- 4. It creates provincial solid waste management boards
 Each province will have an SWM board with members of the provincial
 and local governments, private sector and NGOs. The board will develop
 plans, programmes and initiatives and incentives for implementation of
 the Act. The Board will also oversee and review SWM plans and facilitate
 the regional approach to SWM.
- 5. It creates city and municipal solid waste boards

 Each city or municipality will create a solid waste management board,
 in charge of preparing, submitting and implementing SWM plans for their
 respective jurisdictions

^{67 &#}x27;Clean is beautiful' in Enalish

⁶⁸ ADB, Proposed Technical Assistance to the Philippines for Metro Manila Solid Waste Management, Feb. 2002

- 6. It establishes multi-purpose Environmental Cooperatives or Associations in every LGU Each LGU will promote the creation of cooperatives or associations that work in favour of implementation of RA 9003
- 7. Preparation of a National Solid Waste Management Framework
 The NSWMC will formulate and implement a National solid work
 management framework
- 8. Preparation of Local Solid Waste Management Plans
 Each province city or municipality will prepare its respective 10 year MSW
 plan, which must include suggestions for source reduction, recycling,
 composting and final disposal as well as segregation, source reduction,
 composting and final disposal as well as public education, incentives
 and privatisation of SWM activities. 25 % of all solid waste is required to
 be diverted through reuse, recycling and composting and establish
 reclamation and buy-back centers for recyclables. At the barangay
 level, materials recovery facilities (MRFs) are to be established for final
 sorting, segregation, composting, and recycling, with residual wastes to
 be transferred to a sanitary landfill or other long-term facility.
- 9. It mandates a minimum solid waste diversion rate Each LGU SWM Plan will include an implementation schedule to divert at least 25% of all solid wastes from disposal facilities through reuse, recycling and composting activities within 5 years of passing of RA 9003.
- 10. It bans open dumping and final disposal of wastes should be done by sanitary landfilling
- 11. It bans scavenging activities

These LGUs or Local Government Units refer to individual cities and municipalities. Under the NCR, there are 17 LGUs – 13 are cities while 4 are municipalities. Their involvement in SWM in their respective jurisdictions involves solid waste collection, street sweeping and river clean ups. The quality of services, however, varies from LGU to LGU, depending on their financial capability to deliver SWM services. There is a large amount of controversy that surrounds the way SWM is handled in LGUs. Majority of the LGUs hire contractors to take care of solid waste collection and transport to the dumps for final disposal. Critics say that SWM is plagued with corruption as many contractors, as well as politicians, see this sector as a lucrative venture (PCIJ, 2001). With the passing of RA 9003, they are tasked to formulate 10-year SWM plans which would redirect at least a quarter of generated solid wastes towards reuse, recycling and composting through the establishment of community based

recovery facilities and buy-back centers (ADB, 2002). Considering the abovementioned corruption in SWM, these vested interests are perhaps some of the reasons why there is a delay in the implementation of ESWM's provisions.⁶⁹

5 Sustainability of Integration Of The Informal Sector In Solid Waste Management⁷⁰

Introduction

What is the vision that drives us to seek sustainable integration of the waste informal sector? Foremost is the fact that it provides income and employment to large numbers of waste recyclers at different levels in the recycling business. Not to be underestimated is its value to resource recovery, reduction in solid waste handling and environmental costs. Having said this, the horrific conditions of work of the informal sector warrant the inclusion of a Decent Work Agenda for the Waste Informal Sector as part of the sustainability plan. Quite simply Decent Work according to the International Labour Organisation is work that allows us to

- · Work in dignity
- Earn an income to feed our families
- Educate our children
- Have voice
- Work without discrimination
- Gives us safety and protection
- Provides better standard of livina
- Enables us to retire in dignity

In this chapter, the sustainability of integration of the waste informal sector is examined against the backdrop of four canvases. The first is the historical context, for any discussion on the sustainability of the waste informal sector can only benefit from a glimpse into history. The second are the enabling conditions, which facilitate or retard, the integration process. The third is the framework of State laws, rules, procedures and processes that allow or disallow integration. The fourth is the public or citizens whose active acceptance or rejection of the integration is significant to its survival.

⁶⁹ Approach on Solid Waste Management in Metro Manila, Philippines Rhea Abigail Navarro, LUMES 2002/2003 70 This section taken from Chikarmane, P., Chaturvedi, B., Narayan, L. Recycling Livelihoods: integrating the informal sector in solid waste management in India, GTZ, 2008

5.1 From the pages of history

Two or three centuries ago there was a flourishing informal recycling economy in the developed countries of United States of America and Europe. What happened to those businesses, because indeed they flourished much like any other business albeit with less respectability? Were they wiped out by government diktat? Did they cease to exist because profitability declined as a result of market forces? Were their tinkering low cost arrangements and donkey carts simply wiped out by the shiny new machines and vehicles in the rush and arrogance of modernisation? Was the aesthetics of waste management simply too repulsive for an upwardly mobile citizenry?

Some snippets from the press archives provide an uncanny *deja vu* experience.

As early as 1869, the lucidly and beautifully written article "Our Ragpickers, How and where they live - the fag end of the dry goods business"⁷¹ describes the ragpickers (in the USA) as industrious businessmen and women who are in the "noble profession of saving what others waste."

About their way of working it goes on to say about the waste picker, "No businessman is so absorbed in his occupation and so unconscious of the noise and the tumult of the great world around him." Describing the living conditions in their enclaves it says, "Many of these abodes are very neat in appearance, and the family at home has a similar appearance to that of any respectable labourer man's. Each has a certain space in the basement where they store their property and sort over the merchandise, gathered while out on their business trips."

"On the street, the ragpickers are about the least respected and least regarded of the denizens of the City. At home they are respectable, independent, generally neat, and almost always intelligent. The numbers in the City is nearly 8000; their vocation is humble, but not altogether unimportant. Much papermakers stock, and materials for knife handles, toothbrushes, etc., is rescued by them from utter destruction, and the amount saved in that way in the course of the year is enormous." is what the article concludes with.

"The Rag-pickers of Paris"⁷² published in 1879 describes them as "fortunate in this miserable population (referring to those living in a poor neighbourhood). They work for themselves and sort their own stuff. If in the sack there is anything

⁷¹ New York Times November 21, 1869 Archives of the New York Times

⁷² New York Times October 20, 1879 Archives of the New York Times

of special value they get the profit of it. They need not sell to get a break-fast, they can wait. Some days they make as much as four francs for the family."

Rag-pickers arrested⁷³ published in 1883 refers to ragpickers being fined \$5 for fishing through ash barrels and garbage for treasures with their hooks, as a result of the complaints received from householders about their conduct.

In **Bad for Rag-pickers**⁷⁴, the journalist notes that "The rag-pickers of Paris are in despair" because the Prefect has forbidden them from collecting waste and they are likely to protest.

Ragpickers must go. New sanitary regulations of Paris affect Army of 60,000 (June 15, 1913)⁷⁵ is the title of a news item. It refers to the revolt of 60000 chiffoniers or ragpickers of the "Syndicate of Working Ragpickers of Both Sexes in the Seine Department" against the authorities at the prospect of having their livelihood taken away on account of the new sanitary regulations of the City of Paris. It specifically mentions that they did not get any support from the 300,000 public who thought the health of the city was more important.

What lessons do we learn about the scope for the integration of waste pickers from these snippets.

- 1. There was recognition of the contribution of ragpickers and the scrap traders and recycling to the economy in the mid 1800s itself.
- 2. The collection and sale of recyclables is good business with good earnings.
- Ragpickers have always been self employed and the nature of their work has been entrepreneurial.
- 4. The rest of society has always ignored them, treated them with scorn and disdain and considered them a nuisance. They have also always been subjected to different kinds of harassment.
- 5. Ragpickers were organised and did agitate to protect their livelihoods.
- Ragpickers did change their method of working to undertake collection by carts.
- 7. The sector did not die out because of market conditions but was eliminated by government diktat.
- The Sanitary Regulations in those countries did not make provision to accommodate the work that they were doing although it was considered valuable.

⁷³ New York Times December 19, 1883 Archives of the New York Times

⁷⁴ New York Times January 29, 1884 Archives of the New York Times

⁷⁵ New York Times June 15, 1913 Archives of the New York Times

9. Public support is a determinant in sustainability of informal waste enterprises

If we juxtapose the above lessons with the case studies that are part of this document the similarities are striking. The challenge before us is to reconcile the aspirations of world class cities and the aspirations of the waste informal sector so as to create inclusive environmentally responsible world class cities.

5.2 Enabling conditions for integrating the waste informal ector

Cities aspiring to be world class need to be accountable to the needs of the working poor in the urban informal economy. This is especially so in the case of the workers in the waste informal sector who are concentrated in the segments of informal work with the highest risks. The higher numerical presence and greater vulnerability of women are emphasised in this context. The four enabling conditions that are relevant from the point of view of those promoting the interests of the waste informal sector are:

 Voice - Organisation of working poor, especially women, into membershipbased organisations accountable to their members and representation of these organisations in relevant policy-making and rule-setting institutions.

Typically waste pickers operate individually or by family or in small groups. Their collectivisation in order to improve their collective bargaining ability is central to the integration process. The form of organisation -trade union, cooperative, or company may be subject to debate and deliberation. However, from the experiences in India and Latin America, their organisation has been a precondition to their integration.

2. **Visibility** - Official recognition of the economic contribution of working poor, especially women, through improved labour force and other economic statistics, as well as in policy research.

Studies that quantify the contribution of the waste informal sector to reduction in municipal waste handling costs, environmental costs, poverty alleviation, downstream employment generation, and health costs need to be undertaken to substantiate the demand for integration. In order to be sustainable integration models have to periodically establish statistically that the costs and the ensuing benefits are indeed worth

supporting. For example, systematically monitoring the diversion of waste from the landfill would make a powerful argument for the continuation of informal waste enterprises.

3. **Validity** - Legal identity and recognition of working poor, especially women, and their membership-based organisations.

Several of the waste picker cooperatives in Latin America have developed successful business models. They have found that the ultimate test of the feasibility of these business ventures is political rather than technical. For instance, the waste pickers cooperative in Bogota has had to seek the assistance of activist judges and lawyers to find legal ways to address the political backlash (backed by political power) to their business venture. In Pune too the unanimous resolution to support the waste pickers' cooperative was unanimously rescinded until the State government intervened.

4. Viability - the viability of the waste informal sector has rarely been called into question. This is the single most important reason informal waste enterprises continue to flourish in existing market conditions, unless they are systematically wiped out.

Visibility (recognition of worth) and voice (organisation) are necessary but not sufficient conditions for promoting and sustaining the integration model. Validity and Viability are equally important.

All four exist in varying degrees in each of the case studies that are part of this report. However, full scale institutionalisation of the integration model has either not been attempted or has not been possible in every case.

There are already successful business models of integration among the cooperatives of waste pickers in Latin America. The SWaCH Coop in Pune is a similar social enterprise⁷⁶ of waste pickers to enter and compete in the

⁷⁶ Three common characteristics of social enterprises as defined by Social Enterprise London are:

^{1.} Enterprise orientation: They are directly involved in producing goods or providing services to a market. They seek to be viable trading organisations, with an operating surplus.

^{2.} Social Aims: They have explicit social aims such as job creation, training or the provision of local services. They have ethical values including a commitment to local capacity building, and they are accountable to their members and the wider community for their social environmental and economic impact.

^{3.} Social ownership: They are autonomous organisations with governance and ownership structures based on participation by stakeholder groups (users or clients, local community groups etc.) or by trustees. Profits are distributed as profit sharing to stakeholders or used for the benefit of the community.

recycling industry and perhaps even to negotiate carbon credits⁷⁷. Social and community enterprises have business as well as social objectives.⁷⁸ The sustainability of SWaCH Coop is still to be tested, but suffice it to say many of the elements that make for sustainability are present in this model.

5.3 Legal framework

The elimination of informal waste enterprises in the developed countries was largely due to the fact that the Sanitary Regulations did not take into account the presence of ragpickers and the junk dealers. The same cannot be said to be true in India. Although there is no explicit law regarding informal waste workers and enterprises, there is some amount of legal and policy support for integrating informal waste workers and enterprises. These have been discussed extensively in Chapter II. The state of Maharashtra is notable in this respect, where the Mumbai and Pune case studies have been carried out. The laws, rules, regulations and guidelines favouring the waste informal sector in Maharashtra lent strength to the integration model in Pune.

5.4 Civil society and Public opinion

Practically every city in the developing world wants to metamorphose into a world class city. The change is most often at the cost of the working poor, among whom waste pickers and other informal recycling workers are counted. Concerns of safety, visual pollution and environmental quality in respect of the informal waste recycling sector are often cited by affluent influential citizenry and policy makers alike, to justify elimination of this sector.

⁷⁷ Carbon credits are generated by enterprises in the developing world that shift to cleaner technologies and thereby save on energy consumption, consequently reducing their greenhouse gas emissions. For each tonne of carbon dioxide (the major GHG) emission avoided, the entity can get a carbon emission certificate which they can sell either immediately or through a futures market, just like any other commodity.

The certificates are sold to entities in rich countries, like power utilities, who have emission reduction targets to achieve and find it cheaper to buy 'offsetting' certificates rather than do a clean-up in their own backyard. This trade is carried out under a UN-mandated international convention on climate change to help rich countries reduce their emissions

⁷⁸ Social enterprise is the generic term applied to organisations that are democratically run, owned in common and have social and commercial objectives. Social enterprise refers to a single organisation, and community enterprise refers to an umbrella organisation with multiple trading and social enterprise activities.

The original use of the term social enterprise was first developed by Freer Spreckley in a publication called Social Audit - A Management Tool for Co-operative Working published in 1981 by Beechwood College. In the original publication the term social enterprise was developed to describe an organisation that uses Social Audit. Freer went on to describe a social enterprise as:

[&]quot;An enterprise that is owned by those who work in it and/or reside in a given locality, is governed by registered social as well as commercial aims and objectives and run co-operatively may be termed a social enterprise. Traditionally, 'capital hires labour' with the overriding emphasis on making a 'profit' over and above any benefit either to the business itself or the workforce. Contrasted to this is the social enterprise where 'labour hires capital' with the emphasis on personal, environmental and social benefit."

The pressure on land and the necessity of diverting waste from landfills using either obsolete or untested technologies is an expedient choice for policy makers. Environmental concerns have been placed centre stage on the global agenda. The economic and environmental contribution of waste pickers and the informal waste economy in six cities including Pune have been quantified in a study supported by GTZ and carried out by WASTE. The carbon credit market has suddenly made the waste management business a choice destination for big business enterprises.

The risk exists of the waste recycling sector being overwhelmed by this onslaught like it was 200 years ago in the modernising countries of Europe, North America and Australia. The obliteration of the efficient enterprising waste informal sector in those countries has had disastrous environmental consequences besides escalating the overall costs of waste management and recycling.

In conclusion

The value of the waste informal sector is indubitable. That it is poised on the threshold of change is also not in doubt. The external environment has opportunities as well as threats. The challenge lies in negotiating complexities of the change so as to convert the threats into opportunities. Each of the relevant areas have been analysed in this Chapter. The recommendations below are also framed in a similar manner.





Waste pickers at Payatas Landfill, Philippines

6 Conclusion And Recommendations 79

6.1 Conclusion

Our argument is that the informal sector can deliver on environmental goals more effectively, efficiently, and equitably than exclusively private solutions. Urban poverty in countries like India has been exacerbated because policy makers have singularly failed to comprehend or invest in the entrepreneurialism of the poor. Indeed, most Indian policy makers intuitively mistrust the idea beyond the limited remit of self-help groups and co-operatives. This report suggests that if the poor are incentivised and enabled to augment their capacities and forms of work in a formal and legally protected way – in short, if they are integrated or mainstreamed – their wellbeing would improve, as would the wellbeing of society. While there are standards for composting and technologies, it is essential to create a set of standards for waste handling systems at local and ward levels, including standards for informal sector inclusion.

Needless to add, any policy-making process that is sympathetic to this objective should be participatory and inclusive – consulting informal workers and their organisations and involving as many different stakeholders as possible. It should also allow for policies to be developed through negotiation between appropriate government departments and relevant stakeholders, based on a shared understanding of the economic importance of informal sector waste recycling and the chain of informal enterprises that it is organised around.

The twin problems of rising petroleum prices and the pressures on land point us in two directions as far as the management of waste is concerned. Transport of waste over long distances and the dumping of it in a remote area are fast becoming untenable. Decentralised models of waste management incorporating the waste informal sector are probably the most sustainable alternatives.

6.2. Recommendations

6.2.1 Recommendations for organisations of waste pickers and traders

1. Transform the informal waste recycling sector to stay in the market.

The informal waste sector has to be buoyed up for an image makeover;

⁷⁹ This section taken from Chikarmane, P., Chaturvedi, B., Narayan, L. Recycling Livelihoods: integrating the informal sector in solid waste management in India, GTZ, 2008

assisted to provide professionalised and efficient waste collection services; encouraged to introduce value added services; convinced about the importance of service level benchmarks and monitoring; maintain work ethic and discipline; train waste pickers and itinerant buyers, sorters and graders; in an effort to transform the aesthetics of waste handling to address one of the biggest threats to sustainability. Sustainability of integration is also contingent upon public acceptance of the integration model.

- 2. Improve the skill sets of informal waste workers and managing the change process to convince them that it is in their interests to change Waste pickers being self employed are not accustomed to conforming to rules and regulations. They will have to be convinced to change some aspects of their behaviour and practices in the integration process. Quite often free roaming or autonomous waste pickers will need to be convinced that it is in their own interests to change.
- 3. Enhance the capacity of organisations of informal waste workers to act proactively and respond speedily to change and challenge. The spread of organisations of waste pickers is relatively recent and many of the organisations are in the nascent stages. The threats to the informal sector from big business and technology in the waste management sector are fairly high. The incineration based technologies entering the country will compete for the waste currently collected by waste pickers and informal collectors. The capacity of organisations to counter the offensive of hostile businesses will have to be strengthened and they may not have the resources to do so.
- 4. Constitute a multidisciplinary Technical Support Group that helps with fundraising, activity planning, business modelling, strategic management, capacity building through accompaniment and handholding A good way of backstopping the organisations of waste pickers would be to provide technical and other supports.

6.2.2. Recommendations for Municipal, State and National Governments

1. Recognise and incentivise the waste informal sector through excise, tax and other concessions

- 2. All urban local bodies could register all waste pickers, itinerant buyers and institute a tri-partite board comprising the municipality, scrap traders and waste pickers unions for providing contributory social security that includes a package of life-cum- medical insurance, maternity benefits and old age pension to this group
- 3. Create an unambiguous legal and policy framework for the integration of the waste informal sector
 - (a) Favour informal sector organisations in the contracting process by making the contractual terms relatively simple (b) provide low interest loans to organisations of waste pickers seeking to bid for tenders and contracts (c) Reserve waste collection and small scale processing for small and medium enterprises of informal waste collectors
- 4. Play the role of enabler and regulator for the informal sector in waste
- 5. Institute a system of tax and non-tax based incentives for recycling and use of recycled products which would go a long way in according priority to this important industry. Conversely, disincentivising wasteful use of resources. The application of the Polluter Pays Principle and Extended Producer Responsibility would also strengthen the sector.
- 6. Reserve land in Development Plans for decentralised processing of organic wastes using bio-methods such as bio-methanation and composting etc.
- 7. Reserve space for recycling sheds/ material recovery facilities/ storage of recyclables/ intermediate processing
- 8. Reserve land and creating other infrastructure for scrap commodities markets
- Constitute tri-partite boards with equal representation of waste pickers, traders and government officials that could perform a regulatory and welfare function
- 10. Enforce source segregation of waste in ways that protect the waste pickers' access to and control over recyclables
- 11. Bring out a National Policy on Integrating the Waste Informal Sector in Solid Waste Management

6.2.3 Recommendations for donor agencies and grant making bodies

- Provide financial and non financial support to organisations of waste pickers and others in the waste informal sector
- Advocate for the rights of waste pickers and informal waste workers at national and international fora Invest in different models of organisation of the waste informal sector including social enterprises

6.2.4 Recommendations for waste generating corporate and business houses and industries

- Engage with organisations of waste pickers and informal waste workers to collect, manage and process post consumer waste
- 2. Investe in social enterprises of waste pickers and informal waste workers by providing financial as well as non financial support

6.2.5. Recommendations for civil society organisations and citizens

- 1. Participate in waste management programmes
- 2. Follow rules and regulations
- 3. Support and promote decentralised waste handling systems

We make no claim that the above list of recommendations is anywhere near exhaustive. But a concerted, committed and consistent effort on the part of all of the above persons will undoubtedly ensure the achievement of the goal towards which we are striving.

Annexure

Annexure I: Concept Note for Research on Waste Collectors

Background and Significance:

In November 2006, out of its Regional Conference entitled: Impact of Globalisation: Uniting Women Workers of Asia in Action, the Committee for Asian Women adopted a Program focusing on informal economy to respond to the unique situation of women workers outside the traditional labor force. The conference discussed the organisation's response to the threat of globalisation to labor rights of women.

The conference identified as a particular concern, the plight of working women in the informal economy who are not considered part of the traditional labor sector and therefore have no legal means to demand their rights. One of the main problems identified at the conference is the lack of research and information which could be used for advocacy and intervention; "The plight of this sector needs to be documented"80.

The lack of status of informal workers within in the traditional workforce also adds to the difficulty of documentation and organising. Most vulnerable in terms of physical, economic and social risks are waste collectors, domestic workers and agricultural workers, who come from the poorest and most marginalised classes in Asian societies. Yet they face double challenges due to lack of capacity, support and labor solidarity.

This research proposes to address these difficulties through studies into the profile, challenges and initiatives of waste collectors, towards providing the basis for organising, tools for advocacy and establishing linkages with the formal economy.

Objectives for the research: (outcome)

- Organising tool towards legislation for WC, such as OSH legislation;
- Identification of successful organising strategies;
- Identifying linkages between formal economy and informal work;

Areas that will be covered in the research:

- WC profile and situation:
 Who they are, where they are, kind of work, gender segregated data, mechanised or not
- 2. Case studies: successful organising efforts if any;
- 3. Legislation: efforts towards laws on OSH or others, if any-or the need for training on such

Methodology: Primary and Secondary research

CAW shall appoint a researcher with clear a research outline covering expected Outputs, time frame. The researcher shall compile information from interviews of waste collectors or e-mail correspondence, and through secondary sources such as available books and published materials. The Asian Rural Women's Conference in Chennai and the Global Conference on Waste Collectors in Bogota should provide support through information available and contact of groups participating in these events.

Target Countries: Philippines, India, Thailand

Primary Contacts: ZOTO (Philippines), KKPKP(India), Homenet (Thailand)

Annexure II:Relevant Extracts from Government Orders and Laws in India

II.1. A 2002 order by the Government of Maharashtra, Water Supply and Sanitation Department (Government Circular No. Ghakavya 1001/ Pra. Kra 546/ Papu-22 Mantralaya, Mumbai: 5 January 2002) states that:

- Unorganised rag pickers collecting waste in different parts of the city should be organised with the help of NGOs and should register a cooperative. The local self-government should take the initiative to get these cooperatives registered. Registered rag picker organisations should be allotted the work collecting waste in parts of the city/wards with the help of NGOs.
- While allotting waste collection work to these cooperatives, citizens should be informed of this method. Discussions should be held with people's representatives, eminent citizens. Mahila Mandals⁸¹, and NGOs.

- Those rag pickers who have not registered in a cooperative can also be allowed, under exceptional circumstances, to collect waste on an individual basis after registering themselves with the proper authority.
- The civic authority should grant preference to cooperatives formed by rag pickers in the collection of dry waste.
- If the city has a waste processing unit, the waste collected by rag pickers should be used by it; but rag pickers should also have the freedom to sell it in the market. This will generate income to rag pickers and help improve their living standard.
- The civic authority/NGOs should issue identification cards to registered rag pickers. This will allow citizens to recognise registered pickers.
- The civic authority/NGO should allot a designated area, as per the situation, and assign registered rag pickers or their organisations the task of collecting waste from 250-300 homes.
- The task of collecting bio-medical waste and polluted/toxic waste should not be allotted to rag pickers. Civic authorities should make separate provisions for collecting these forms of waste, as well as for storing, disposing, and monitoring it effectively.

II.2. Maharashtra Non-biodegradable Garbage (Control) Ordinance, 200682

to prevent throwing or depositing non-biodegradable garbage in public drains, roads, wetland, wasteland, water bodies, places open to public view, to regulate the use of non-biodegradable material and for matters connected therewith or incidental thereto.

- 5. Provision for the replacement of receptacles and places for deposit of non-biodegradable and establishment of waste collection system It shall be the duty of the local authority or any officer authorised by it, to –
 - a) Place or provide or place in proper and convenient situation public receptacles, deports or places for temporary deposits or collection of bio-degradable garbage.
 - b) Provide separate dustbins for temporary deposits of nonbiodegradable garbage other than those kept and maintained for deposit of biodegradable garbage.

⁸² Extract from Maharashtra Non-biodegradable Garbage (Control) Ordinance, 2006

- c) Provide for the removal of contents of receptacles, deposit and of the accumulation at all places provided or appointed by it under clause (a); and
- d) Arrange for recycling of the non-biodegradable garbage so collected.
- 6. Duty of owners and occupiers to collect and deposit non-biodegradable garbage, etc
 - It shall be the duty of owners and occupiers of every land and building to -
 - Collect or to cause to be collected from their respective land and building the non-biodegradable garbage and to deposit, or cause to be deposited, in garbage receptacles, deposits or places provided for temporary deposits or collection of the non-biodegradable garbage by the local authority in the area;
 - ii. Provide separate garbage receptacles, other than those kept and maintained for deposit of biodegradable garbage, of the type and in the manner specified by the local authority and the officers for collection therein of all the non-biodegradable waste from such land and building and to keep such receptacles or dustbins in good condition and repair;
 - iii. Segregate and store the waste generated by then into a minimum of two receptacles on for biodegradable waste and other than non-biodegradable waste.
- II.3. Maharashtra Non-biodegradable Solid Wastes (Proper and Scientific Collection, Sorting and Disposal in the areas of the municipal corporation) Rules 2006⁸³.

ENVIRONMENT DEPARTMENT. GOVERNMENT OF MAHARASHRA NOTIFICATION.

3. Responsibility of Municipal corporations: (1) The municipal corporation shall within limits of the territorial area, be responsible for the implementation of the provision of these rules and for any infrastructure developed by for collection, sorting, segregation, transportation. Processing and disposal of non-biodegradable solid wastes

⁸³ Extract from Maharashtra Non-biodegradable Solid Wastes (proper and scientific collection, sorting and disposal in the areas of the municipal corporation) Rules 2006

(2) The Municipal Corporation shall:

- i. with the help of any agency including non-government organisation and self help group set up non-biodegradable waste collection centres at various places in each ward depending upon the estimated quantum of waste generation in the area and the density of the population
- ii. carry out segregation of waste at every collection centre
- iii. permit the rag pickers to separate the waste and to take away nonbiodegradable waste form such collection centres.
- iv. Provide enough space to deal with and enable category-wise sorting and segregation of waste;
- v. Provide appropriate arrangement to avoid mixing of nonbiodegradable and biodegradable solid waste and receptacles placed from this purpose at public places;
- vi.Place a minimum of two separate receptacles of different colours for biodegradable and non-biodegradable garbage at public place to prevent mixing and spilling of the garbage at the public places and maintain uniform colour code system for the receptacles placed at the public places for this purpose;

Recyclable waste sorting centre provided by the Pune Municipal Corporation

- vii. Use and provide proper vehicles for transportation of such garbage so as to avoid mixing of non-biodegradable and biodegradable waste during its transportation. Transportation vehicle shall also the covered appropriately to avoid the spillage of garbage on the roads during the transportation.
- viii.In consultation with State Pollution Control Board provide specially designed landfill site restricted to non-biodegradable inert waste and other wastes that wastes that are not suitable for recycling for any processing and that the land filling shall be carried out in proper and scientific manner.

- ix. Waste and debris excavated / removed from sewers, gutters and nallahs and total solid waste collected in a corporation area with respect to non-biodegradable waste. Item-wise categorisation / classification of such non-biodegradable waste shall also be carried out. Such analyses report shall be submitted to state government on or before be fifteenth day of the June every year.
- x. Comply with the time limit specified in schedule.

II.4. Action Plan for Effective Implementation of Municipal Solid Wastes (Management and Handling) Rules, 2000, Government of Maharashtra⁸⁴

- 22. One of the best options is to give contracts for door to door waste collection to NGO's or SHG's. This option is less expensive and can provide employment to the deprived section of urban population. For skills of rag pickers to segregate the waste can also be put to use. Instead of keeping them at the end of waste collection chain and obtaining recyclable things only from community bins or from the mixed garbage thrown on land fill sites, rag pickers should be given multiple contract to collect waste form door to door and take it to processing plants. In many cities, underprivileged sectors of the society such as rag pickers, women & youth groups are being involved for waste collection. Therefore NGO's, voluntary organisations and self helpgroups should be encouraged to form co-operative organisations of rag pickers women groups under Suvarna Hayanti Shahari Rojgar Yojna,. Following actions be taken:
 - i) Loans form the bank and subsidy under SJSRY should be made available fir these groups.
 - ii) Wearing Uniforms , carrying identity cards, assigning attractive designations (Swachhata Door) will help them gain status and dignity in the society.

Action point 5: Encourage waste reduction

31. Decentralised waste processing and reduction of waste is today's need. Collection, transportation & at the land – filling of unlimited and consistently increasing amount of waste is not a viable either financially or environmentally, Therefore there is need to encourage citizens to reduce waste. The following actions be taken:

⁸⁴ Action Plan for Effective Implementation of Municipal Solid Wastes (Management and Handling) Rules, 2000, Government of Maharashtra, Government Resolution No. SWM 1006/C.R.53/ U.D.16 dated 26 October 2006

- (a) Encourage bulk waste generators to process their waste themselves through biogas or vermin composting projects. Encourage residents' groups to set up small composting pits. Provide free technical guidance for vermin composting, etc.
- (b)Levy reduce lesser services changes from generators who hands over only dry waste.
- (c) Set up purchase centers/processing centers for dry waste.
- (d)Consider charging lesser property tax shops of kabariwalas, etc which buy recyclable items.

Charging fees for door to door waste collection.

- 24. Better results are obtained when houses have to pay a contractor for waste collection Residents ensure that service is provided daily & in a proper way. Municipal bodies need not inspect the daily record for workers presently. Therefore a contractor should be allowed to collect user charges directly from each house.
- 25. If contracts are given to self -help groups only for waste collection, then they can recover 1 €cent to 1.7 €cent per house per month. If the contract includes collection and transportation, they can be allowed to recover approximately 3.4 €cent per month per house. Municipal bodies can initially pay a part of this amount till the contractor can encourage citizens to pay the charges. The Municipal bodies can subsequently reduce the direct payment gradually. This amount can paid through 12th Finance Commission Grants. Under no. circumstances payments should be made on the bases of attendance. It should be accordance with the number of houses in the great of work.
- 26. A local committee comprising of representatives of local residents & selected Corporators can monitor the work of such an agency.

II.5.General Body Resolution No. 476, Pune Municipal Corporation85

 One central Cooperative will take responsibility for the door to door collection of waste in the entire city. This will lead to a uniform process and implementation of segregation and disposal of waste. This will

⁸⁵ Unofficial translation of Pune Municipal Corporation General Body Resolution Number 476 dated 22 Feb 2007 for forming and supporting a cooperative of waste pickers

- also help in bringing about due control and coordination over the process. One representative of Pune Municipal Corporation and one representative of "Kagad, Kach, Patra Kashtakari Panchayat" will be represented on the proposed Cooperative.
- 2) This central proposed Cooperative will work autonomously and be a Cooperative of waste collectors.
- 3) Pune Municipal Corporation will guide this Cooperative but this Cooperative should be an independent organisation. The employees or members of this Cooperative will not have any relation or employment ties with the Pune Municipal Corporation.
- 4) The proposed Cooperative will work in a decentralised manner with local citizen's groups and other non government organisations. The proposed Cooperative will directly collect the fee from the individual households or the establishments for the service provided by them and will be directly accountable to the local citizen's group for providing the service. This process will guarantee 100% segregation of waste in the Pune city and also a uniform system for collection of waste from every household, which will ultimately result in a clean city. Along with this it will help in providing an opportunity to the poor for self-employment and improve their health. This will result in reducing the waste transportation cost of the Pune Municipal Corporation.

Considering the above points the Pune Municipal Corporation issues the following guidelines for segregation, collection and disposal of waste:

1) The responsibility of the collecting the segregated waste and bringing it to the Municipal collection point should be assigned to the Cooperative of the waste collectors. All the individuals currently collecting waste should be involved in this Cooperative and the responsibility of waste should be given to them in the area they are already working in. In areas where which there is work, but where there are no people already working, a public notice in a newspaper should be published inviting people interested in working on this project and then the people should be chosen from the applications received. People below the poverty line will be given priority. All these chosen people will be given membership to the Cooperative.

- 2) The Cooperative will operate in all the administrative municipal Ward Offices in the city. An advisory and coordination committee comprising of the local citizens' group, NGOs, Ward Medical Officer of Pune Municipal Corporation, Ward officer should be formed and this committee will provide help, coordination and guidance to the proposed Cooperative's branch working in that ward.
- 3) There will be one kothi team for each kothi, and there will be one supervisor for each kothi team. Every waste collecting couple will have responsibility for collecting segregated waste from 500 houses or small shops. To help and coordinate with the kothi team in the ward there will be local citizens' group, one representative of the medical and sanitation department and the local Corporator.
- 4) Considering the number of houses or geographical continuity of the houses every team should be given responsibility of 4000 houses. (Roughly area of one kothi).
- 5) The cooperative societies, establishments, apartments, chawls, lanes etc. getting involved in this project will be attached to one of the Kothi teams.
- 6) The management of the kothi team working in the area of the Ward office will be with the area coordinator of the proposed Cooperative.
- 7) The office of the Central Cooperative will look into the daily work of the Cooperative like: accounting, coordination, collecting information, government liasoning, solving the problems or addressing complaints of the citizens while working, training etc.
- 8) The citizens and commercial establishments should segregate the wet and dry waste (minus the recyclable waste) and give it separately.

The Organisation's work:

- 9) The segregated waste will be collected by one pair (two people) from 500 households.
- 10) The domestic biomedical and hazardous waste and commercial waste, should be collected by the proposed Cooperative for

- a higher fee. Citizens should responsibly dispose off such waste directly by themselves at a place predefined by the Pune Municipal Corporation.
- 11) The garden waste and the construction material or waste will not be collected by the proposed Cooperative. The Pune Municipal Corporation will collect this waste on a fixed day.
- 12) A sorting centre for segregation of recyclable waste and non recyclable waste, should be decided depending upon the geography and population of the city, but as far as possible the Pune Municipal Corporation should try to provide one center per Kothi.
- 13) The Pune Municipal Corporation will further collect the wet waste collected by the members of the proposed Cooperative by their own machinery from the decided place and at a decided time.
- 14) The waste from the offices and the shops will be collected by the proposed Cooperative and the residents will pay the Cooperative the prescribed fees for the services. But at places, where the number of shops and offices is more there the Cooperative should discuss with the establishment, the procedure of collecting waste as well as the related rules and price for collection of waste.
- 15) The bulk organic waste producers like hotels, wedding halls etc. are not included in the above-mentioned machinery. The Pune municipal Corporation will have an independent procedure for the same.
- 16) The cooperative housing society, citizen's group, proposed Cooperative etc coming under the same Ward office will enter into a contract, which will include the procedure of collecting waste and the amount to be charged for the same etc.
- 17) The responsibility of the citizens, waste collectors Cooperative and the Pune Municipal Corporation is well defined in this process, and if the work is not completed as per the responsibilities assigned, then the defaulter will be punished with fine. The citizens will be fined and reprimanded if the waste is not segregated, the Cooperative will be fined and reprimanded if the waste is not transported at the predefined place, and the officer of the Pune Municipal corporation will be fined

- and queried if the waste is not collected from a predefined place and transported to predefined place in 24 hours.
- 18) The Pune Municipal Corporation should provide the proposed Cooperative with handcart maintenance amount, uniform security gloves, insurance and other necessary things/ services.
- 19) The Cooperative will charge €cent 17 p.m per house for collection of segregated waste.
- 20) The waste collector will have rights to the recyclable waste and will retain the income earned from its sale.
- 21) The Pune Municipal Corporation will pay €cent 1 per month per slum household to the Cooperative and the Cooperative can charge €cent 1 per hut to the citizens in slum.
- 22) The success of the project depends upon the capabilities of the proposed Cooperative in handling the project and hence training should be given to the Cooperative for effectively handling the waste, segregation, reuse of waste etc at every level.
- 23) Various projects should be implemented from reuse of waste and vermiculture from wet waste should be initiated. Such projects can also provide opportunities for self-employment. Priority should be given to the poor people living below poverty line.
- 24) Pune Municipal Corporation is expected to assist the proposed Cooperative for the initial five years with training, to create awareness among citizens, to pay honorarium to the proposed machinery etc. for a period of five years after which this Cooperative will be selfsufficient.
- 25) For effective working of the Cooperative, guidance, to acquire support of the citizens for this project and proper coordination between the Pune Municipal Corporation and the proposed Cooperative a committee has been appointed.
- 26) If the work of the proposed Cooperative is not satisfactory, then the Pune Municipal Commissioner is authorised to terminate all its help

provided to the Cooperative and find for an alternative to carry out the work. The Pune Municipal Commissioner should be authorised to take the necessary decision regarding the same.

27) The required funds will be allotted from the appropriate budget of the Solid Waste Management.

Annexure III: Profiles of organisations of waste pickers or working with waste pickers

Organisation	Year Of establishment	Туре	Membership Numbers Integrated	Integrational Activities with Waste Informal Workers	Other Activities with Waste Informal Workers	Level of integration
Aakar	Trust 1997, Coop 2007	Society/Trust, Cooperatives	4000 members, 10 integrated	doorstep collection of waste, road sweeping	insurance, savings and credit	ULB given collection contracts,
All India Kabadi Majdur Mahasangh				doorstep collection of waste		
Apnalaya, Kachra Kamgar Sanghatana	Trust 1973, Wastepickers 1996	Society/Trust	360 members		Formal integration	not much
Bal Vikas Dhara		Society/Trust Cooperative		awareness generation, campaigning for integration, child labour	savings and credit	
CHINTAN	2000	Society/Trust	17000 members and 350 integrated	Doorstep collection, institutional and commercial areas waste, composting, recycling centre, public awareness, composting, research, advocacy.	Education with children, legal rights and policy education.	ULB given I cards, various confracts
CITU	2008	Trade Union	1000	awareness generation, campaigning for integration	savings and credit, insurance	

Table I: Profile of organisations of waste pickers or organisations working with waste pickers in India

Organisation	Year Of establishment	Туре	Membership Numbers Integrated	Integrational Activities with Waste Informal Workers	Other Activities with Waste Informal Workers	Level of integration
Forces	2000	Society/Trust	1200 members, integrated 100	doorstep collection of waste, composting, scrap shops, pet bottles shredding	education, training	ULB given scrap shops spaces, collection contracts
Hamal Panchayat				awareness generation, campaigning for integration		
HARIT Recyclers Association	2004	Society/Trust	members 10,000, integrated 300	doorstep collection of waste, scrap shops, collection of tetrapak		State given safety equipment
Janadhar Seva bhavi sanstha Janaseva Ghana Kachra Vyasthapan Sahakari Sanstha	Trust 1995, Coop 2003	Society/Trust Cooperative	Members 500, integrated 350	doorstep collection of waste, composting, scrap shops, bio fuels	savings and credit, education, vocational training, insurance	ULB given I cards, subcontracted cleaning contracts
Janvikas Kendra	Coop 2005	Society/Trust Trade Union Cooperative	700 women	Hotel waste collection, scrap shops, composting	insurance, savings and credit, child labour	ULB given I cards, subcontracted cleaning contracts
Kachara Kamgar Union	2007	Trade Union		awareness generation		
Kagad, Kach, Patra Kamgaar Sanghatana		Formative stage		awareness generation		ULB given memorandum for I cards

Organisation	Year Of establishment	Туре	Membership Numbers Integrated	Integrational Activities with Waste Informal Workers	Other Activities with Waste Informal Workers	Level of integration
KKPKP Sangli		Trade Union		awareness generation		
LEARN - Kachra Patra Kamgaar Sanghatana	Trust 2000, TU ongoing	Society/Trust, trade Union	members 1000	research, documentation ongoing		
Lokvikas	Trus 1998, TU 2001, Coop 2008	Society/Trust Trade Union, Cooperative	Members 3500, integrated 100	doorstep collection, composting	health awarenss, insurance, savings and credit	ULB given collection contracts, sorting spaces, infrastructure- handcarts
Nari Pragati Mahila Mandal			62	Scrap shops		
Navsarjan Trust		Society/Trust		Scrap shops		
NIDAN	Trust 1996, Company 2008	Society/Trust, Company	Members 3000, integrated 400	doorstep collection, composting	health awarenss, insurance, savings and credit	ULB given collection contracts, place for sorting, money for infrastructure-equipment, composting contracts

Organisation	Year Of establishment	Туре	Membership Numbers Integrated	Integrational Activities with Waste Informal Workers	Other Activities with Waste Informal Workers	Level of integration
CHF - Church of North India SSI	2008		500			ULB to provide support for improving work conditions at landfill and in certain locations
SEWA	1972	Society/Trust Trade Union Cooperative Society/Trust Company	Membership 30000, integrated	doorstep collection, composting, contracts for cleaning, advocacy	education, awareness generation, insurance, savings and credit	ULB given collection contracts
Stree Mukti Sanghatana	Trust 1985, Parisar Bhagini Vikas 2004	Society/Trust Cooperative	3500, integration 350	Scrap shops, compost, biogas, publications research, publications	training, education, savings and credit, insurance	ULB given collection contracts, sorting spaces, compost contract, biogas contract
Waste Wise Trust	1987 Maitreyi, Waste wise 2003	Society/Trust	integrated 400	doorstep collection, composting, contracts for cleaning, advocacy	education	ULB given compost contract, doorstep collection etc, all withdrawn now
Kagad, Kach, Patra Kashtakari Panchayat	TU 1993, Credit Coop 1996, Service Coop 2007	Trade Union/Credit Cooperative/ Service Cooperative	Members 6000, integrated 1500	Doorstep waste collection-domestic, institutional, commercial. composting, recycling centres, cash for trash centres, public awareness, research, advocacy, housekeeping contracts	insurance, savings and credit, child labour, education, training	ULB gives I cards, insurance cover, space for scrap shops, sorting sites, support for integration

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Lakshmi Narayan and Poornima Chikarmane have jointly undertaken the following research studies that are relevant to the waste informal sector.

- Recycling Livelihoods: Integration of the Waste Informal Sector in India (GTZ 2008)
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