

Waste Industry Safety and Health Forum FORMAL GUIDANCE DOCUMENT

HAND SORTING OF RECYCLABLES ('TOTTING') WITH VEHICLE ASSISTANCE

This guidance has been developed by the Waste Industry Safety and Health (WISH) Forum to help control safety and health risks in the waste management industry associated with hand sorting of recyclables ('totting') with vehicle assistance The Health and Safety Executive (HSE) was consulted in the production of this publication. It endorses the sensible, proportionate, reasonable and balanced advice to owners on managing the risk from this guidance during the waste-related activities as set out in the guidance.

This guidance provides advice about removing waste or recyclables through sorting by hand picking from the floor activities or 'totting'. It aims to prevent accidents and ill health to people who work in waste and recycling facilities, and is particularly targeted at employers, managers and supervisors. It includes advice about how to assess hazards and provides solutions that will help to eliminate or reduce the risk of serious injury or ill health.

In particular, it will help to solve workplace transport problems and prevent accidents to pedestrians involved in totting activities.

It also touches upon:

- Manual handling
- Slips and trips
- Hygiene and welfare and
- Other environmental considerations

If you are an employer, manager or supervisor, you should consult your workforce, draw on their experiences and request suggestions regarding health and safety arrangements and working practices.

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1. Introduction

This guidance was produced by the Waste Industry Safety and Health (WISH) forum in consultation with the Health and Safety Executive (HSE).

It aims to help eliminate or reduce the risk of injury or ill health that may arise from totting activities. In particular, it is intended to help prevent accidents to pedestrians who have to operate in close proximity to moving vehicles.

It is primarily written for employers, managers and supervisors of waste and recycling facilities where totting takes place.

The guidance does not aim to be comprehensive, but contains notes and examples that will help you to comply with the law and that you may find helpful in considering what you need to do.

2. What is totting?

Totting refers to the manual removal of materials direct from waste streams without the use of a picking line or other dedicated recycling plant. It includes the practice of sorting through waste by hand to remove recyclables with a commercial value or, alternatively, removing contaminants from recyclable materials on a routine basis.

Typically, totting activities are carried out on a low 'pile' of material placed on the floor for sorting by manual means. It is often carried out using mechanical shovels, or other plant to rake/shift through the piled materials to reveal items for removal by hand.

Totting may include the:

- Routine removal of waste items that could result in blockages or other problems with plant
- Routine 'polishing' of otherwise clean waste streams, such as removing plastic packing tape from an otherwise clean load of segregated cardboard, or the removal of plastics and other contaminants from green waste and/or
- Routine removal of recyclable materials from mixed or partially-segregated waste streams on the floor of a transfer station, eg the removal of items with residual value from mixed waste

It does not cover the removal of asbestos-containing materials or waste that a site is not permitted.

3. Associated risks

The most serious risk associated with totting is a collision between a vehicle (eg lorry) or mobile plant (eg mechanical shovel) and a pedestrian (eg totter). Such collisions are almost always serious and can be fatal. Accidents happen because working practices have failed to achieve **effective segregation of moving vehicles from pedestrians.**

This guide concentrates on controls that can be put in place to reduce workplace transport risks. However, other hazards and risks are also outlined, including:

- Manual handling
- Slips and trips
- Hygiene and welfare and
- Other environmental factors

4. Assessing the risks

The Management of Health and Safety at Work Regulations 1999 require employers and selfemployed people to carry out a suitable and sufficient risk assessment of their activities.

Your risk assessment will help you to:

- Identify the hazards that can cause harm
- Identify who is at risk, eg workers, contractors, subcontractors, agency and temporary workers, members of the public or visitors
- Assess the risks from those hazards
- Eliminate or reduce risks (by using appropriate control measures), so far as is reasonably practicable and
- Record any significant findings

Your risk assessment should be regularly reviewed to ensure that any control measures put in place remain effective. When reviewing, you should consider the following:

- Is there a safe system of work in place that reflects the risks associated with totting?
- Do your employees follow those systems of work? If not, why not?
- Are your systems adequate to control the risk? Do they need revising?
- Are the procedures and checks you have put in place sufficient?
- Do you need to do certain tasks more (or less) frequently?
- Are there any changes to the working environment that might have an impact?

This guidance gives examples that will help you to comply with the law, and may be used to assist with the risk assessment process. It is not, however, a substitute for a suitable and sufficient site or task-specific risk assessment based upon individual site conditions, layout, structure, exact nature of the totting activity, the types of waste material involved and other factors. For further information www.hse.gov.uk/risk/index.htm

5. Eliminating risks

Totting may be viewed as a cost-effective method to recover recyclables from mixed waste. It is not always as efficient as using mechanised methods, which can also remove people from areas where vehicles operate. Remember, different approaches adopted to eliminate a particular risk might introduce different risks that will also need to be considered and adequately controlled (eg guarding of machinery).

Workplace transport risks associated with totting can be eliminated by using material reclamation facilities (MRFs). MRFs effectively sort waste using magnets, eddy current separators, trommels etc. They often include a conveyor belt system that enables safer hand sorting of waste away from all vehicle movement. HSE has published guidance setting out ergonomic considerations for designing and selecting conveyors.

Totting to remove waste items that may cause blockages or other problems can be eliminated by:

- Installing a picking line or other sorting plant
- Using mobile plant, such as a 'grab', to remove incompatible waste items that can cause blockages and
- Encouraging suppliers and customers to pre-sort wastes so they do not need to be separated or 'polished' on site

6. Reducing risks – implementing control measures

If totting is required, control measures should be applied to minimise the risks.

6.1 Workplace transport

The control of traffic and the effective segregation of vehicles and plant from pedestrians is an important consideration when deciding on the risk control measures you are going to implement. All vehicles (including mobile plant) and pedestrians should be segregated from each other so far as is reasonably practicable.

The information below focuses on this specific risk. More information about controlling workplace transport risks can be found at www.hse.gov.uk/workplacetransport/index.htm

Safe site

Inevitably, vehicles will need to access the totting area at times (eg lorries delivering waste material to the area, mobile plant taking recyclables away or levelling/raking out waste to make it easier to pick from). In addition, there may be other site traffic movement in close proximity to the totting area.

It is essential that totters are protected from all works traffic. Reliance on procedural controls alone (such as instructions that exclude vehicles from totting areas while pedestrians are present) is unlikely to be totally effective.

Totting should not take place where there is little or no physical protection for totters from vehicle movements. The following general points should be considered.

- Design the site to ensure good visibility for drivers, eg avoid blind corners, provide mirrors for increased visibility and ensure adequate lighting is provided
- Take steps to exclude non-essential pedestrians from specific areas (such as material reception bays and loading areas) where vehicles operate. Consider the practicalities of:
 - Improving the layout so that vehicle-operating areas do not need to be entered (eg prevent their use as a means of access or shortcuts to other places)
 - Introducing clearly signposted walkways and protected areas for pedestrians (safe refuges) and
 - Removing or protecting other pedestrian workstations from traffic areas/routes

Layout and structure of totting areas

Totting areas should be designed and constructed so they provide physical protection to pedestrians from vehicles. Options could include:

- Using an existing waste bay with walls on three sides to provide a dedicated area for totting
- Using an existing push-wall arrangement to provide a safer area for totting
- Using a separate building or physically separated section of a larger building
- The construction of a dedicated totting area using 'A' frame concrete frames or similar; or
- Using an existing structure, such as the support legs for a recycling plant, to form part of (or one side of) a protected totting area

It is important that the layout and structure of the area allows for the reach of plant lift arms, shovels, grabs etc as well as the risk of wastes or other materials being dropped or ejected.

Pedestrian access to the totting area

Any totting area should have the following features:

- A separate pedestrian access point, ie vehicles and pedestrians should not use the same access point
- Pedestrian routes to and from the totting area situated away from traffic movements; and
- A separate route for pedestrians to access a picking cabin or other facility without having to walk across the tipping floor

Separate access can be achieved by cutting an access door into the rear of an existing waste bay, by leaving a gap in panels or by using 'A' frames to construct a protected totting area. In other cases, no modification may be needed, such as where an existing structure is used as one side of a totting area, which allows pedestrian but not vehicle access (see Figure 1).

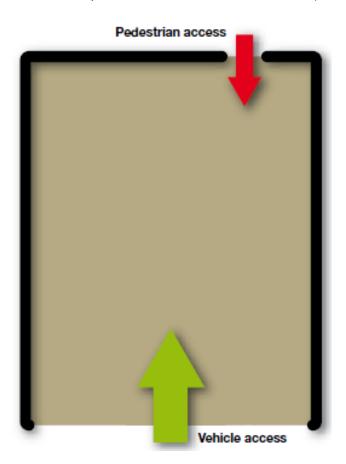
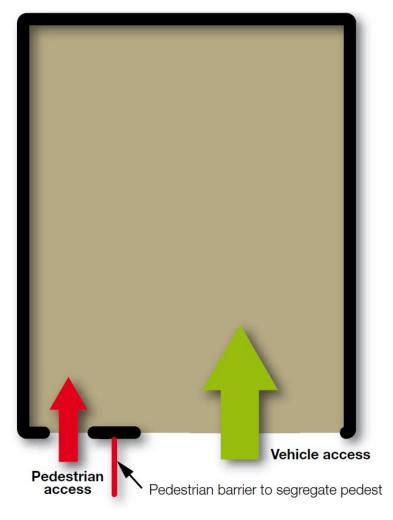


Figure 1: Example of separate vehicle and pedestrian access to a totting area

Example of totting area – three-sided protection (push-walls, existing structures such as bay walls etc) and separate vehicle and pedestrian access (pedestrian access door in rear of bay).

The site layout will determine the location of the pedestrian access point to a totting area. In some circumstances, pedestrian access may be close to, or next to, the vehicle access point. In these situations you should consider using pedestrian barriers to prevent pedestrians using the vehicle access point (Figure 2).

Figure 2: Example of using a pedestrian barrier near to vehicle access point

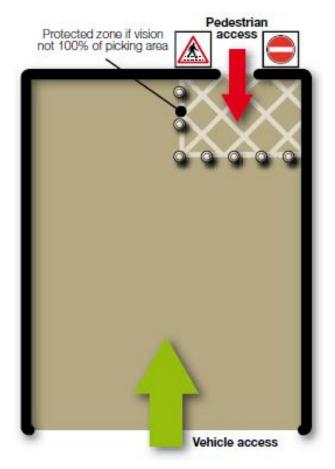


Example of a totting area where vehicle and pedestrian access points are close to each other – consider using a pedestrian barrier to ensure vehicle and pedestrian flows do not mix.

For all pedestrian access points, you should consider whether there is adequate protection for pedestrians from vehicle movements. For example, where vision between the totting area and the pedestrian access point is limited, or where there is a risk of a pedestrian stepping into the area while vehicles are operating, you should consider providing suitable protection just inside the access point (see Figure 3).

Put suitable warning signs at the pedestrian access point instructing totters that access is forbidden while vehicles are operating in the tottir hen the vehicles are temporarily stationary (see Figure 3).

Figure 3: Example of pedestrian protection at the access point to a totting area



Example of a protected zone for pedestrians when entering a totting area if vision is limited or if there is the risk of pickers stepping into the area while vehicles are operating. Clear warning signs used to alert pedestrians at the access point.

Vehicle access to the totting area

No vehicles, even if temporarily stationary, should be in the totting area while totting is taking place. The only exception to this might be 'plant assist' removal of large or bulky items for which specific controls will be required (see below).

As mentioned above, reliance on procedural instruction that excludes vehicles from totting areas while pedestrians are present is unlikely to be totally effective on its own. As a result, vehicle/plant access points should be protected with a suitable barrier (manually placed or powered), or an alternative system, eg drop barrier, hinged gates etc. Where provided, barriers should be:

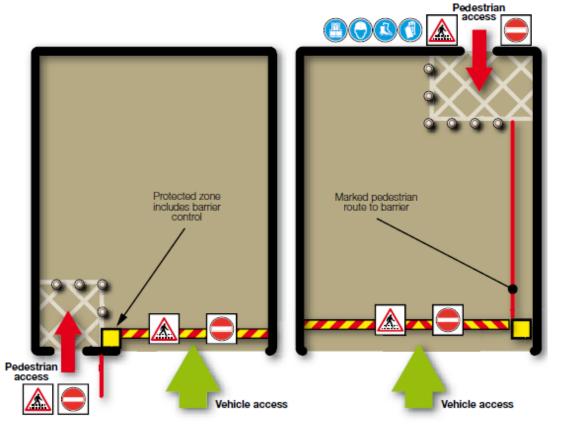
- Robust, so that any driver will be aware of any collision with the barrier
- Clearly visible (hazard stripes, painted in bright colours or similar) and clearly signed to indicate no vehicle/plant access; and
- Capable of being closed/lowered/put in place from inside the totting area

Skips, bales or any other temporary items that require plant or a vehicle to move them may be used to form barriers. However, the use of traffic cones, plastic barriers, hazard tape etc should be avoided – they can be hit by vehicles/plant without the driver being aware. Chains and cables are also not recommended for similar reasons. Other systems, such as electronic sensors, 'magic eyes' etc linked to an alarm system may be used. These should be subject to a risk assessment to determine their suitability.

Ideally, the barrier control operating point should be located so that pedestrians are not required to cross the totting area to operate/place the barrier (for powered barriers, remote control systems may be of use). This will not be practical in all cases. In such cases, the procedure for totting should make it clear that all vehicles should have left the area before the barrier is placed. You could also consider a marked and/or protected pedestrian route to the barrier operating point (see Figure 4).

As with pedestrian access points, suitable and clear signs should be in place to warn drivers not to enter when the barrier is in place and pedestrians are in the totting area. Signs at the vehicle access point can also be used to reinforce a procedure, eg 'sound horn and wait at barrier'.

Figure 4: Examples of access to barrier operating point



Left – pedestrian access is next to the barrier controls.

Right –
pedestrian
access is
away from the
barrier controls
and is via a
marked
walkway.

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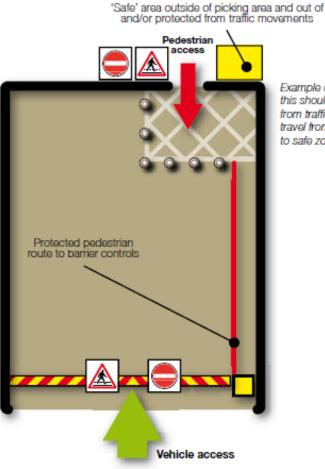
Safety zone provision

A segregated, protected safety zone (or refuge) should be provided for totters to enter before any vehicle or mobile plant (eg mobile shovel) enters or is operating in the totting area.

Establishing a safety zone should be an integral part of the site design. All totters, plant operators etc must be made aware of the function of the safe zone and the requirement to use it. The following should be considered when providing safety zones:

- They should be clearly marked and signed
- Drivers should be able to see totters easily
- If practical, safety zones should be located outside of the totting area (see Figure 5); and
- Safety zones located within a totting area should have effective protection against vehicle impact by being of sufficiently robust construction, eg fixed bollards, traffic crash barriers and fixed concrete frames etc

Figure 5 Example of a safe zone located just outside a totting area

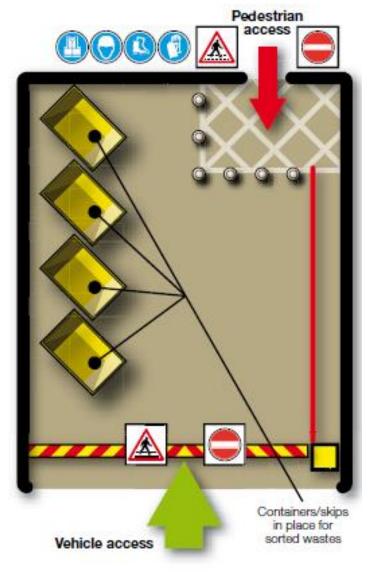


Example of safe zone outside a totting area – this should be out of traffic flows or protected from traffic. Think about the ways pedestrians travel from mess rooms, welfare facilities etc to safe zones.

Containers and stockpiles

For lighter wastes, provide containers to place sorted materials and wastes into, for example, wheeled bins, skips or half-height larger containers (see Figure 6). Full-sized containers may not be suitable due to their load height. The nature (size, weight etc) of some sorted wastes or other site operations (such as how sorted wastes are moved around site) may mean that providing containers is not practical. For some types of sorted wastes you may need to use 'stockpiles'.

Figure 6 Example layout with use of containers for sorted wastes



Example of a totting area layout showing containers used for depositing sorted wastes.

Safe vehicle

Mobile plant used to assist with totting should:

- Have effective all-round (360°) visibility, facilitated by use of visual aids (such as side-mounted and rear-view mirrors, rear-view cameras/CCTV) and other aids identified by your risk assessment. Consider blind spots produced by plant attachments, lift arms, cab supports/corner posts, loads, exhausts and other parts of the vehicle. The level of vision, and the equipment needed to provide that vision, should be determined by your risk assessment
- Be in good condition, with windows, operating lights, reversing warning systems and other safety aids maintained in working order, clean and properly adjusted. Warning devices and reversing/vision aids should be robust and effective; and
- Be appropriate for the task, eg some totting areas are relatively small and the size of plant used may be an issue

Carrying out scheduled checks (eg daily, weekly) and maintenance, combined with effective supervision, should ensure that mobile plant and vehicles are maintained in a safe condition.

Any specification and selection of plant and vehicles should take account of the above factors.

The specification and condition of third-party lorries, delivering or removing wastes, may be more difficult to control. For example it is not a legal requirement for all road vehicles to have an audible reversing warning fitted. Site risk assessments should consider such aspects and, if necessary, consider setting required standards in contracts and providing visiting drivers with clear information and instructions.

Safe driver

All drivers (including temporary/agency staff) should be:

- Trained and competent to operate plant and vehicles
- Fit and physically capable of operating plant and vehicles safely
- Trained to set the aids provided and be able to use them to their maximum potential. They should recognise which aid to use and when to use it within each manoeuvre cycle
- Fully familiar with the safe system of work to be used in association with pedestrian workers
- Able to communicate clearly with pedestrian workers (eg by clear signals and/or two-way radio); and
- Regularly monitored and assessed to ensure that they operate safely, eg monitored to ensure they comply with speed limits and reversing procedures, as well as how they interact with pedestrian workers

Safe workers

Totters should:

- Wear personal protective equipment (PPE), including high-visibility clothing, as appropriate
- Be adequately trained and provided with sufficient information and instructions
- Keep to the recognised safety zones when vehicles are operating; and
- Be fully familiar with, and adhere to, the safe systems of work

Safe systems of work

The key objective of any safe system of work associated with totting is to **effectively segregate moving vehicles from pedestrians**. The safety of totters relies upon vehicles not operating in the totting area while pedestrians are present and vice versa.

It is important that:

- Drivers never start or continue vehicle movements unless all totters can be seen in the agreed safety zone, before and throughout any material transfer, depositing and raking/sifting activity
- Drivers stop whenever any totter is not visible in the pre-agreed safety zone
- Totters do not approach the picking pile unless the vehicle has withdrawn to its pre-agreed and demarcated safe place and has stopped or has exited the totting area; and
- All other pedestrian personnel are excluded from the totting area

Remember that other vehicles (such as tipping vehicles), aside from those involved in the sorting process, may need to enter the totting area. Your systems should ensure that all drivers (including visiting drivers, if appropriate) are familiar with the safe systems of work to ensure vehicle/pedestrian segregation is maintained. Guiding such vehicles with a banksman is a high-risk activity and this option should only be used when it is not possible to implement any other reasonably practicable measures such as improved site layout. Further guidance on the role of banksmen can be found in Safe transport in waste management and recycling facilities Waste 09 (see 'Further reading').

Written safe systems of work for totting should also include consideration of other hazards, risks and controls, such as those for manual handling, slips and trips, hygiene and welfare, PPE etc.

Routine totting

Your risk assessment should identify the control measures needed for each circumstance. A formal written procedure, covering appropriate aspects of the safe system of work for totting, should be available. For routine totting activities, this should include:

- The conditions under which totters (and other pedestrians) can enter the totting area
- The conditions under which vehicle/plant can enter the totting area

- The location of a safety zone to give totters refuge when vehicles/plant are in the totting area
- Clear instructions to vehicle drivers/operators to stop operating or moving if a totter or other pedestrian enters the totting area
- Clear access points so the totting area is only accessed by totters (and other pedestrians) via the pedestrian access and not via the vehicle/plant access point
- The route to be taken from mess and welfare facilities to the totting area and safety zone
- A clear indication that failure to follow the procedures is likely to be a disciplinary offence

When totting is aided by the use of mobile plant/plant assist, a safe system of work should involve the following in this order:

- Tipper vehicle deposits materials and withdraws from the totting area
- Totter approaches picking pile from the safety zone and removes materials
- Totter returns to the safety zone
- Mechanical loading shovel enters working zone and sifts materials before withdrawing to a preagreed and demarcated safe distance

This routine should be repeated until the recyclables/contaminants are removed.

Removal of materials from totting area

Once sorting is complete, sorted material and residual waste needs to be removed from totting area.

If wheeled containers are provided and removed manually, then the route taken should be segregated from traffic flows, eg by going via the pedestrian access point, if practical, or by stopping traffic during the removal of wheeled containers.

If larger containers, such as skips are used, or wheeled containers need to be removed by a vehicle, then totters should retire to the safety zone during the removal process.

When residual wastes or stockpiled sorted wastes are being removed by mobile plant (eg loading shovel), then all totters should retire to the safety zone.

If a grab or similar item is used to remove residual waste, stockpiled waste or large/heavy/bulky items, totters should retire to the safety zone. No totter involvement is normally required for large/heavy/bulky item removal where a grab is used. If, however, the grab operator requires direction, this should be undertaken if those assisting can be sited a safe distance away (eg a distance greater than the operational sweep of the grab at a minimum).

In some circumstances, large/heavy/bulky items may need to be removed using plant assist to avoid manual handling risks. If a loading shovel or similar is to be used to remove the items, totters may be required to assist by placing the items into the loading shovel's bucket. If this is the case, a strict procedure should be in place to ensure the loading shovel or similar equipment is not in operation while totters are in close proximity. The safe system of work for such a procedure should be based on a full risk assessment, but may include the following:

- Loading shovel arrives and stops at traffic barrier at vehicle entrance to totting area and totters retire to the safety zone
- Totting supervisor opens barrier and retires to the safety zone
- Loading shovel enters totting area, manoeuvres as close as practical to the items to be collected and places bucket flat on the floor
- Loading shovel powers down completely
- Supervisor enters totting area once the shovel has powered-down and closes traffic barrier to prevent other vehicles entering
- Totters enter totting area and place items into the loading shovels bucket ensuring that items are stable and secure in the bucket
- Totters retire to the safety zone
- Supervisor opens traffic barrier and retires to the safety zone
- Loading shovel is powered, lifts items and removes them from the totting area
- Supervisor enters area once it is clear of all vehicles and closes traffic barrier
- Totters enter area to recommence totting

Communications

It is important to ensure that communication between drivers and pedestrians, using two-way radios and/or clear hand signals, is clear and unambiguous.

All signals should be:

- Agreed in advance and understood by all involved
- Given from the protection of the safety zone or other suitably segregated area

A two-way radio can also assist with the control of site traffic movements.

Supervision

The outcome of a vehicle/pedestrian collision is likely to be serious if not fatal, so the level of supervision and monitoring needs to be commensurately high.

Consideration should be given to nominating one of the totters to be supervisor or 'team leader'. This supervisor should:

- Be competent for the role (this is likely to require a mix of experience, training, ability, demonstrating suitable behaviours and attitudes to controlling activities and enforcing procedure and discipline)
- Ideally, not actively take part in totting (although this may not always be practical)
- Have their role clearly laid out in the written procedure for totting

6.2 Manual handling

Musculoskeletal disorders, resulting from manual handling tasks, are one of the main causes of sickness absence for waste management industry workers. There is a significant risk from totting activities, which you should consider when assessing whether or not to adopt it as a method of work.

Picking lines (such as those used in MRFs) are designed to keep waste material for sorting at a height that is ergonomic for most people to pick from (around waist level) and will help to eliminate, or at least reduce, manual handling issues. This is clearly not the case with totting, which normally involves repeated bending down.

In addition to the general duty to carry out a risk assessment, employers and the self-employed must also assess the risks associated with significant manual handling tasks in their workplace. Whether a specific manual handling assessment is required under the Manual Handling Operations Regulations 1992 (as amended) will depend on issues such as load weight, where it is being lifted from, frequency of lift etc. This is a matter for individual assessment based on site operations and the nature of the wastes to be sorted.

To reduce manual handling risks, you should consider:

- Using hand-operated grabs (sometimes called pick-up sticks) to reduce the need to bend
- Using rakes or other reach tools to pull waste items out of a pile and push them along the floor to a stockpile for handling by mobile plant
- Placing containers for sorted wastes close to the waste pile to reduce the distance items need to be carried
- Providing basic manual handling training and instructions, which highlight associated risks

Further information on manual handling and musculoskeletal disorders can be found at www.hse.gov.uk/msd/index.htm.

6.3 Slips and trips

Slips and trips are one of the most common types of accidents suffered in the waste management industry and this should be considered in your risk assessment to help identify the control measures to put in place. Such measures may include:

- Designing totting areas that are well compacted, flat and even
- Maintaining good housekeeping standards across the premises
- Keeping totting areas as clear as practical, particularly pedestrian walkways, safety zones etc
- Clearing totting areas regularly (eg daily) of all residual wastes
- Instructing totters not to climb up waste piles or 'wade' into wastes
- Providing suitable footwear, such as lace-up safety boots that give increased ankle support

Further information on slips and trips can be found at www.hse.gov.uk/slips/index.htm.

6.4 Hygiene and welfare

Totting puts people in close contact with many waste products that have the potential to cause injury or ill health. These include:

- Contaminated sharps such as needles
- Other sharp items such as glass
- Biological hazards from organic wastes
- Chemical hazards from substances such as bleach bottles
- Asbestos and other waste materials that produce hazardous dust
- Hygiene and offensive wastes such as nappies, animal faeces and sanitary waste
- Animal carcasses

Careful selection of the types of waste to be hand sorted should form a part of the site's waste acceptance procedures. This will ensure that unsuitable wastes are not presented for sorting and should also serve to identify the source of waste streams that may pose unacceptable risks.

Even with careful selection, relatively clean waste streams may still contain non-conforming material. Make all totters aware of the potential risks, what to look out for and what action they should take if they find non-conforming materials.

You should also provide adequate PPE (see section below) and welfare facilities. In particular:

- Provide adequate washing facilities and encourage totters to use these frequently
- Ban eating, drinking and smoking from operational areas (including safety zones)
- Provide advice and awareness training about covering open wounds in operational areas,
 leptospirosis controls and other hygiene considerations

6.5 Other environmental hazards

You should also consider the following when assessing totting activities:

- Lighting conditions to allow totters to sort wastes and allow vehicles to move safely and effectively
- Dust and fume levels and possible control measures, eg extraction systems, suppression systems, suitable respiratory protection
- Noise levels and possible control measures, eg noise reduction, screening, suitable hearing protection

7. Personal protective equipment (PPE)

Suitable PPE should be provided to protect against hazards as identified in your risk assessment. PPE provided could include:

- High-visibility clothing
- Suitable gloves, taking into account the nature of the wastes being sorted
- Safety boots (including protected toecap and mid-sole)
- Robust clothing such as overalls
- A safety helmet
- Dust mask (if required)
- Hearing protectors (if required)
- Eye protection (if required)

All PPE provided should be suitable and appropriate for the risks involved and the conditions. It should also be maintained in good condition.

Users should be adequately informed, instructed and trained in the use of PPE and wearing it should be strictly enforced. Mandatory signs (see Figure 7), placed in a prominent position, can be used to remind totters of PPE requirements.

Figure 7: Example of mandatory signs for PPE



8. Information, instruction and training

Workers must be given enough information, instruction and training to carry out their duties safely and effectively. Totting activities should not be carried out unless those involved (including plant operators) have been inducted and trained on safe systems of work and are clear about the processes to be followed. Any new worker, including temporary workers, should be inducted and trained before being allowed to commence work.

All plant operators involved in totting activities should be fully trained and competent in operating the plant they will be using. Other important considerations should include:

- Control of third-party lorry drivers delivering wastes to the totting area. Site driver rules should include rules for entering the totting site
- Information, instruction and training provided to workers may need to reflect situations where
 English is not the first language
- Signs and instructions need to be clearly understood by all workers and visitors. Using diagrams rather than words can avoid confusion

9. Worker consultation and engagement

Workers should be consulted and engaged regarding the health and safety arrangements and working practices. Their support is essential in ensuring safe working. Safety representatives and other workers can contribute positively in achieving the desired outcomes by:

- Identifying problems;
- Indicating whether activities can be carried out safely under prevailing conditions; and
- Generating sound practical ideas and solutions.

Further information on worker involvement can be found at www.hse.gov.uk/involvement/index.htm

10. Reporting and investigating accidents

There is a requirement, under the Reporting of Injuries, Diseases and Dangerous Occurrences Regulations (RIDDOR) 1995, to report specific types of accidents/incidents to the relevant enforcing authority (usually HSE). Further information on the reporting of incidents at work can be found at www.hse.gov.uk/riddor/index.htm.

Because workplace transport accidents often have serious outcomes, it is recommended that all incidents involving totting, including non-RIDDOR-reportable accidents, near misses, failures in control such as a lapse in PPE or traffic barrier use (whether an injury or incident occurred or not), should be reported to site management and investigated. Investigations should aim to reveal the immediate and underlying causes, ensure that lessons are learnt and remedial action is taken.

References and further reading

Ergonomic Considerations for Designing and Selecting Conveyor Belt Systems www.hse.gov.uk/waste/conveyorbelt.pdf

Investigating accidents and incidents: A workbook for employers, unions, safety representatives and safety professionals HSG245 HSE Books 2004

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Handling needles in the waste and recycling industry Waste19 HSE 2007 www.hse.gov.uk/pubns/waste19.pdf

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The Waste Industry Safety and Health (WISH) Forum exists to communicate and consult with key stakeholders, including local and national government bodies, equipment manufacturers, trade associations, professional associations and trade unions. The aim of WISH is to identify, devise and promote activities that can improve industry health and safety performance.

Further information

This guidance is issued by the Waste Industry Health and Safety (WISH) Forum to help control the safety and health risks associated with, Hand sorting of recyclables ('totting') with vehicle assistance. Following the guidance is not compulsory, unless specifically stated, and you are free to take other action. But if you do follow the guidance you will normally be doing enough to comply with the law. Health and safety inspectors seek to secure compliance with the law and may refer to this guidance. Some parts of the guidance represent good practice and may go further than the minimum you need to do to comply with the law.

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