
Non-technical Summary (Amended October 2014)

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Attachments in this Section include:

A.1 Non-technical Summary (amended 7th October 2014 to include additional information provided to the EPA in compliance with Environmental Protection Agency (Industrial Emissions) (Licensing) Regulations 2013 S.I. No. 137 of 2013.

Introduction

A non-technical summary has been prepared in accordance with Article 9.2 (w) of the Environmental Protection Agency (Industrial Emissions) (Licensing) Regulations 2013 S.I. No. 137 of 2013

An application for an Industrial Emissions Licence is currently under consideration by the Environmental Protection Agency (EPA). The application is being made by

O'Toole Composting Limited,
Ballintrane,
Fenagh,
Co. Carlow.

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The registered office of O'Toole Composting Limited is Rathbawn, Tullow, Co. Carlow.

O'Toole Composting Limited is in the Planning Authority functional area of:

Carlow County Council
County Buildings
Athy Road
Carlow Town
Co. Carlow

There is no discharge of trade effluent or other matter to sewer from the facility. The sanitary authority area in which this facility is located is the HSE South, Carlow Community Care, Athy Road, Carlow Town, Co. Carlow.

The facility is located in the townland of Ballintrane in Fenagh, Co. Carlow. The National Grid reference for the facility to which this application relates is S 7886 6762.

The site which is 4.87 hectares in area is located in a rural area where the predominant land use is for agriculture. The closest dwelling located 170 meters south of the facility.

The site itself is well serviced with road networks as can be seen in Figures 1 and 2 below. The site is located directly off the N80 Carlow/Rosslare Road, approximately 6km south east of the M9 Dublin/Waterford Motorway. The main entrance of the facility is located at the north west corner of the site, just off a local access road Jocks Lane, which runs perpendicular to the main N80 roadway. Sufficient sightlines are at either side of the access lane for safe access and egress to the facility.

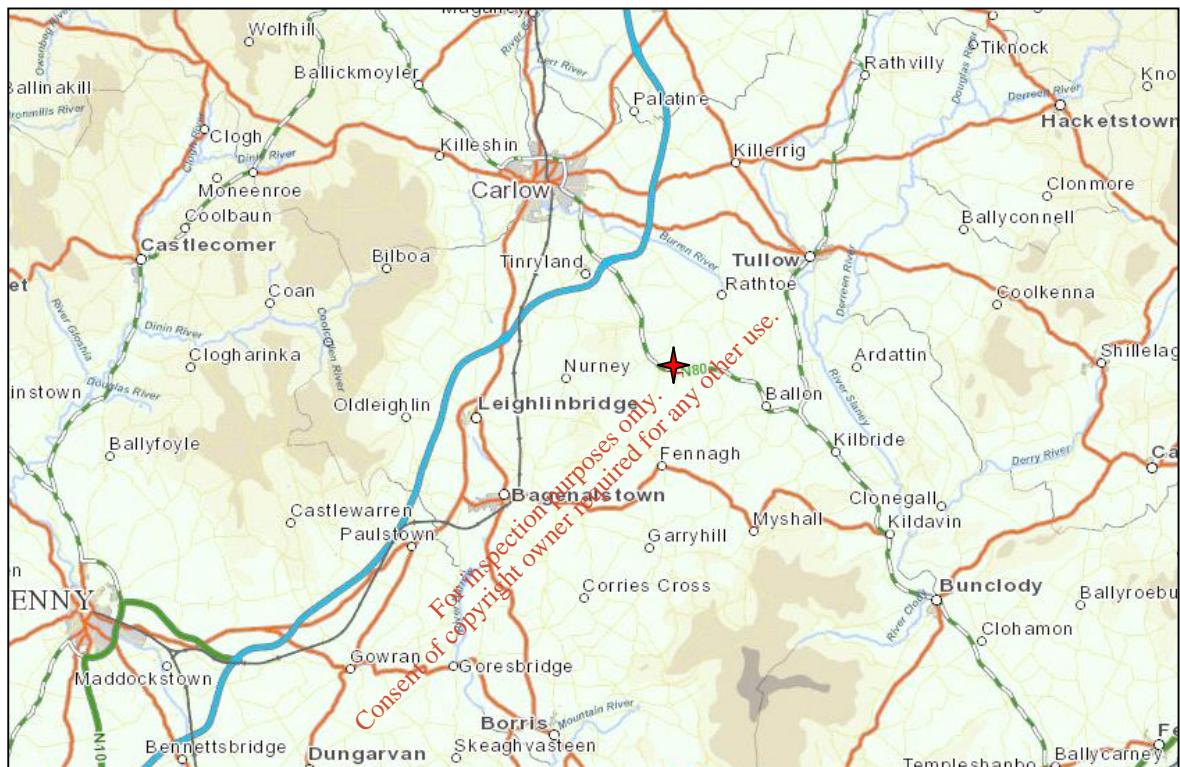


Figure 1: Detailed Site Location Map

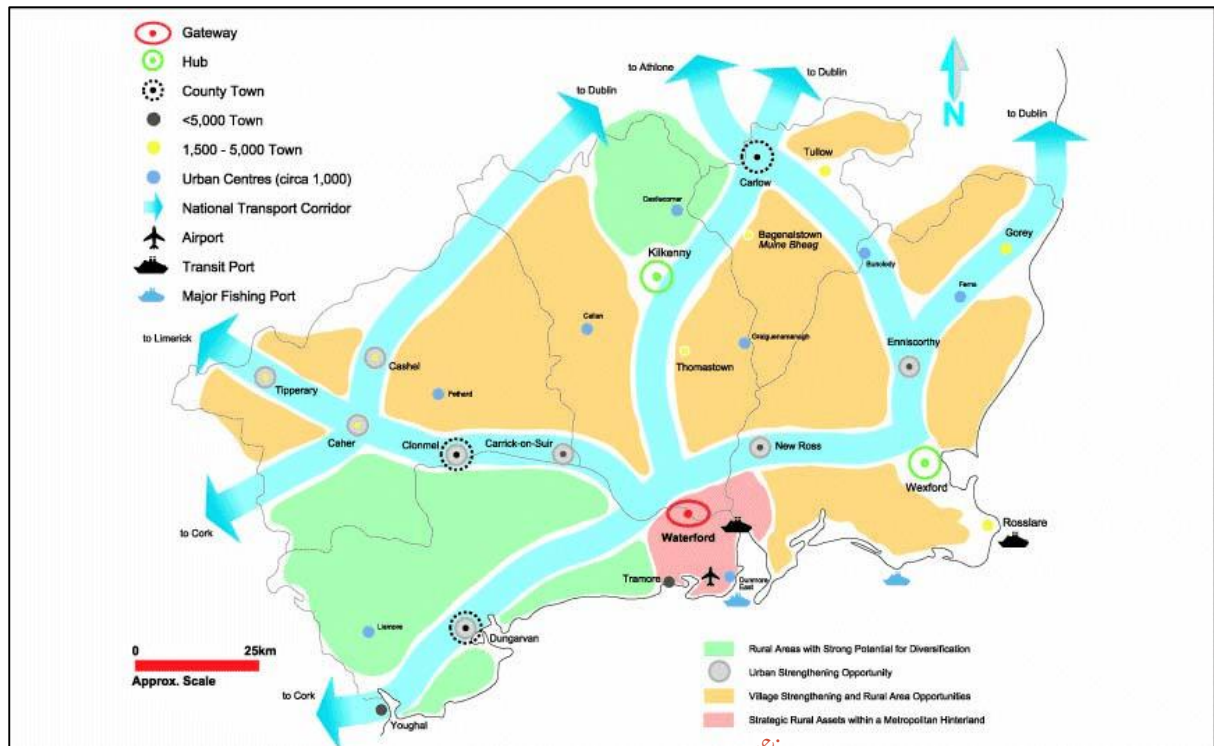


Figure 2: South East Region Transport Corridor

As can be seen from Figure 2, O'Toole Composting is in a central location off the national transport corridor, Carlow being a county town which links the gateways of Waterford and Dublin and the hub towns of Kilkenny and Wexford.

This facility currently operates a waste transfer and composting facility with a permitted annual intake of up to 25,000 tonnes. O'Toole Composting Limited are now proposing to expand the current operations at the facility.

The development will see an increased intake of organic waste for composting and or municipal solid waste for drying and stabilisation, with a proposed maximum annual intake of 40,000 tonnes. As the remainder of this material is transported offsite for further recovery this is regarded as an MBT process. From an MSW of 100% there will be a moisture loss of 43%, Compost Like Output (CLO) of 22% and Dried waste of 35%. This will be further recovered to SRF (Solid Recovered Fuel) 21%, Metal 2%, Plastics 4%, with a residue of 8% for disposal. This will see the composting infrastructure that is currently in place at the facility being used to its maximum capacity.

It is also proposed to construct a civic amenity facility which can be used by members of the public for their waste and recycling. It is also proposed to increase the tonnage of waste accepted in the current waste transfer building up to a maximum tonnage of 20,000 tonnes per annum. Waste material will be bulked up in this building prior to it being transferred offsite to a waste processing or landfill facility. In addition a

processing plant will be installed in this building to maximise recycling and recovery of this type of material. This plant will utilise screening, shredding, magnets and a wind - shifter. A proposal to include an Anaerobic Digester as part of this development will not now proceed.

The following information is contained in the application in compliance with the Environmental Protection Agency (Industrial Emissions) (Licensing) Regulations 2013 S.I. No. 137 of 2013

(b) The number of employees during normal levels of operation is 14.

(c) The relevant classes in the First Schedule to the Act of 1992 to which the industrial emissions directive activity relate are:

11.1 'The recovery or disposal of waste in a facility within the meaning of the Act of 1996 which facility is connected or associated with another activity specified in this Schedule in respect of which a licence or revised licence under Part IV is in force or in respect of which a licence under the said Part is or will be required.' And 11.4(b)'Recovery, or a mix of recovery and disposal of non-hazardous waste with a capacity exceeding 75 tonnes per day involving one or more of the following activities. (other than activities to which the Urban Waste Water Treatment Regulations (S.I. No. 254 of 2001) apply).'

(i) biological treatment.

(d) Details of application for planning permission and an Environmental Impact Statement are attached in support of this application.

(f) Details of fuels and raw materials utilised by the facility are supplied as part of the application. Raw materials used at this facility include water, electricity and fuel such as diesel and gasoil. Other substances used at the facility are for the operation of machinery such as engine oil, transmission fluid, Ad Blue, antifreeze and lubricants.

(g)The plant, methods, processes ancillary processes, abatement, recovery and treatment systems and operating procedures for the activity are detailed in the original application in Attachments C and D which detail the management systems infrastructure (including details of all plant and machinery) and operation respectively. These are further described in Section 1.3 and 1.4 of the EIS.

Infrastructure, plant and equipment are currently in place for the existing operations at the facility. Apart from the development of a new civic amenity facility and the installation of two new bio-filters and an airlock there will be no changes to the current infrastructure on-site. On-site processes include the acceptance, storage, composting/drying of municipal solid waste and transfer offsite of wastes. Future on-site processes may include mechanical biological treatment. Approval will be sought

from the EPA for any proposed new waste processing activity prior to it being commenced at the facility.

All waste vehicles entering the facility are weighed before they enter the site. The vehicle registration, waste type, source of waste and gross weight are all recorded at this point. The vehicle is directed by the weighbridge operative to the appropriate tipping area for that particular waste type. Once waste has been tipped it is inspected by a trained staff member to ensure that the waste type is acceptable. If the waste is found to be unacceptable or contaminated it is rejected from the facility. If the material is accepted the driver is directed back onto the weighbridge where the empty weight will be taken to generate the nett weight for the load. Records of all wastes accepted or rejected from the facility will be maintained on-site at all times.

Mixed waste including skip waste, domestic and commercial waste will be directed to the waste transfer station. Skips or collection vehicles will be emptied on the floor area of the building that has been designated as the waste inspection area. All materials in the skip will be inspected once tipped and if the waste is acceptable it will be moved into the temporary storage bay prior to it being transferred offsite to a waste processing facility. Any unacceptable wastes or wastes that are considered hazardous material such as light bulbs, paint cans, waste electrical goods, batteries will be separated from the waste and stored in assigned banded containers in the designated quarantine area until they are collected by an approved contractor.

The Facility Manager will organise vehicles for the transportation of the mixed waste offsite. The mixed waste will be loaded into articulated trailers by the on-site teleporter. The waste will be sent to an approved waste processing facility for further processing, recovery, recycling or disposal. No wastes will be kept on-site long term and there will be no disposal of waste at the facility.

Segregated wood waste will be directed to the wood storage bay by the waste transfer station. All untreated wood such as timber pallets will be temporarily stored in the wood bay. Untreated wood will be shredded on-site. The wood chip that is produced is then used in the composting process. Any treated wood (e.g. wood that has been varnished), will be treated as mixed waste and send off-site for further processing.

Civic amenity facilities for use by members of the public are limited at present. It is proposed to design and expand a new area to be used as a civic amenity facility for members of the public. This area will consist of skips, containers and compactors for the acceptance of various waste household streams such as cardboard, dry recyclables, plastics, waste electrical goods, glass, wood, textile, rubble, batteries, tyres, municipal waste and food waste. All vehicles wishing to access the civic amenity facility will be directed to the entrance by the weighbridge operative. The containers in the civic amenity site will be emptied as necessary at the end of each working day. Biodegradable waste for composting or MSW for drying/stabilisation will be directed to the composting shed. If the biodegradable waste is accepted it is moved into the

delivery bay area. This waste is shredded and then loaded into one of the composting tunnels. After 7 to 10 days the material is removed from this composting tunnel and placed into a second composting tunnel where it is left for a further 7 to 10 days. Each of the composting tunnels are controlled by a specially designed computerised system. This computerised system can control and monitor the temperature and moisture levels to ensure that the correct conditions are maintained within the tunnels to ensure that the composting process is carried out appropriately. A specifically designed floor piping system has been installed in the composting tunnels known as an aeration floor. Air can be introduced to the tunnels via this piping system.

Air is circulated throughout the organic material and is extracted from the tunnels via the overhead duct work. The introduction of air to the material during composting is known as an aeration process.

Once aeration has taken place in the tunnels, material from the tunnel will be discharged via the back door of the tunnel where the materials is screened. The large particles of waste, called oversize, are removed from this area and re-circulated to the waste intake area so that they can be mixed with fresh incoming waste and be further broken down by going back through the aeration process.

The undersize (particles that meet the size grade) is transferred to the maturation floor. The composted material is left on the maturation floor for five to seven weeks to cure. In the case of stabilised MSW the organic fines or 'compost like output' is screened and the remainder of the material sent for further processing into Solid Recovered Fuel (SRF)

(h) Details of best available techniques (BAT) conclusions in respect of the facility are detailed in a report submitted in support of the application. The best available technology has been installed at the facility. A fully computerised GICOM composting system has been installed in the composting building. All future investments will consider best available technique prior to purchase.

(i) Details of potential emissions are given in Attachment E of the original application and the potential impacts and proposed mitigation measures where appropriate are addressed in the EIS as follows:

Odour – EIS Section 3.4

Surface Water – EIS Section 3.2

Groundwater – EIS Section 3.2

Noise – EIS Section 3.6

(j) Proposals for control and monitoring are addressed in Appendix F of the original application.

At present monitoring is carried out at the facility in locations identified in Figure 3. It is proposed to continue environmental monitoring at each of these locations as part of this Licence application. It is not anticipated that any of the emission limit values will be exceeded due to the environmental management systems that are in place at the facility. In the event of any emission limit values being exceeded at any stage, the exceedence will be treated as an environmental incident. All environmental incidents will be investigated to determine the root cause of the incident. Retesting will be carried out as part of the incident investigation process. Once the root cause of the incident has been identified, appropriate corrective and preventative action measures will be put in place so as to limit or eliminate the environmental consequences of such an occurrence. Emission Limit Values have been proposed for SW1 and SW2 in line with the EPA's Interim Guideline Values.



Figure 3 On-Site Monitoring Locations

- ◆ Air Sensitive Receptors
- Dust Monitoring Locations
- PM10 Monitoring Locations
- Noise Monitoring Locations
- ▲ Surface Water Locations

(k) Details and an assessment of the impacts of any existing or proposed emissions on the environment as a whole, including on an environmental medium other than that or those into which the emissions are or are to be made, and details of the

proposed measures to prevent or eliminate, or where that is not possible to limit, reduce or abate emissions are addressed in detail in the EIS Volume 2 Section 3.

The main potential emissions from the facility include dust, noise, litter, flies and odour. Control measures are currently in place at the facility to control the level of emissions and to reduce or eliminate emissions where possible. These control measures, which include daily site inspections, are to ensure that any emissions from the facility do not give rise to nuisances at any of the facility surrounds.

Dust generation is mainly from traffic movement to and from the facility during periods of prolonged dry weather and the tipping of dry wastes at the facility. It is proposed to concrete the remainder of the yard area of the facility over a phased basis which should reduce dust levels. In dry weather conditions the yard area will be dampened down with water to prevent dust becoming airborne. In addition to this vehicles delivering and removing waste from the facility will be covered to prevent dust and litter escaping from trailers. All waste handling will occur within the facility buildings. A negative air odour extraction system is in place in the composting building and is proposed for the waste transfer building. This extraction system will also remove dust particles from the building.

The processing of waste will occur indoors which will limit the generation of noise, litter and flies in the surrounding area to the facility. Machinery will be well maintained to avoid any noise from friction or vibration. Noise monitoring will be conducted on an annual basis, or as required by conditions of the licence, to ensure that noise levels are not exceeding the recommended environmental limits. Litter should be limited at the facility as vehicles delivering or removing waste to or from the facility will be covered and any litter that occurs will be swept up once spotted or reported. Daily site inspections will be carried out to inspect for nuisances including dust, noise, litter, flies, mud or odours. If any nuisances are noted during the daily inspections corrective action will be taken.

An odour impact assessment model was carried out which predicts the potential impacts from odour if this facility were to expand as is proposed by this application. The odour models in this report predicts that there will be no impact from odour at any of the neighbouring properties to the facility.

As the facility is currently operational it is not considered that there will be any new emissions introduced as a result of the facility operations. Existing site practices will continue in relation to the environmental management of the facility to limit any potential increase in emissions. All wastes will be processed indoors. Due to the building design and infrastructure emissions from the facility will be limited and controlled.

(l) The need for the development and the main alternatives considered by the applicant are addressed in the EIS Volume 2 Section 1.2.1 and 1.2.2. As the existing processes use Best Available Technology there is no further need to look at alternative processes.

(m) The condition of the site is described in detail in the application.

(n) As the original site was agricultural use the baseline for this site is a greenfield site.

(o) The Air Dispersion model is based on parameters that are stricter than standard conditions.

(p) As this processing facility will not give rise to pollution over long distances or in the territory of other states section p does not apply.

(q) The measures to be taken under abnormal operating conditions, including start-up, shutdown, leaks, malfunctions, breakdowns and momentary stoppages are addressed in Attachment Q of the original application. In addition Fire Safety has been addressed in Section 3.3.6 of the EIS. An accident prevention policy and an emergency response procedure is in place at the facility. These policies and procedures will ensure that necessary measures will be taken to prevent accidents and if an accident occurs it will limit the consequence of the accident for the environment. Fire water tanks have been installed at the facility which will acts as a fire fighting water source in the event of a fire. At present there are six 5,000 gallon tanks on-site.

(r) There are no short or medium term proposals to close the facility or to cease operations at the facility. In the unlikely event that activities cease at the facility, the facility will be closed so that no environmental liabilities remain at the facility. All wastes will be removed from the facility and transferred to an approved waste facility. Buildings, plant and machinery will be washed down, disinfected or drained of any fuels as necessary. O'Toole Composting Limited will have financial resources available to ensure that the facility can be retendered free from environmental liability if activities cease at the facility. A fully costed CRAMP and ELRA has been supplied to the Agency.

(s) Arrangements for prevention of waste in accordance with Part III of the Act of 1996 is not applicable to this facility. The activities of the facility contribute to national waste management policy and in particular the implementation of the Landfill Directive (1999/31/EC) which requires member states to engage in the progressive diversion of biodegradable municipal waste from landfill. This is addressed in detail in Section 1.6 of the EIS Volume 2 Section 1. The composting activity carried out on site (as indeed are the other activities) is in the third tier of the Waste Hierarchy namely recycling/composting.

All waste on-site will be handled and processed on-site in a manner that will not affect the recyclability of the materials. Recyclable waste will remain segregated from non-recyclable wastes at all times. Any residual waste at the facility that results from the processing of waste will be transferred offsite to an approved facility. A segregated bin system is implemented in the facility offices for the segregation of all recyclable wastes. Waste from the recycling processes such as waste oil or fuels will be stored in bunded containers and collected from the facility by an approved contractor. No other wastes will be produced on-site. No wastes will be disposed of at the facility.

All wastes temporarily stored at the facility will be transferred offsite to approved waste facilities for further processing, recovery, recycling, waste to energy or disposal. Waste will only be transported by an approved haulier that holds a waste collection permit. Any excess liquid waste water runoff from the composting building will be tankered offsite to an approved waste water treatment plant.

(t) Non-hazardous domestic & commercial waste will be accepted at the facility for composting and waste transfer. The proposed quantities of wastes are as follows

MSW or Biodegradable for Stabilisation/Composting:	40,000 tonnes per annum
Waste transfer (MSW, C&I and C&D wastes):	20,000 tonnes per annum

A full detailed description of all waste types including the European Waste Codes as presented by Commission Decision 2000/532/EC of 3 May 2000 11, are included in Attachment H.1 of this application.

(u) The European Communities (Control of Major Accident Hazards Involving Dangerous Substances) Regulations 2000 (S.I. No. 476 of 2000) do not apply to the proposed activities at this facility.

(v) The bedrock in the underlying area of the facility is that of granite and other igneous intrusive rocks. Due to the nature of the proposed activity and the underlying bedrock it is considered that the activity will not give rise to an emission into an aquifer containing the List I and II substances specified in the Annex to Council Directive 80/68/EEC of 17 December 1979.