FARM PRACTICE NON-AGRICULTURAL WASTE

Description

Non-agricultural waste can be used as a fertilizer or as a soil conditioner. Sources of non-agricultural wastes vary widely and not all are acceptable for use as soil amendments. The use of non-agricultural waste is regulated by the Environmental Management Act. The Act includes regulations, codes of practice and guidelines which address such concerns as the health of humans, animals, plants and the ecology of application sites. Non-agricultural wastes which are commonly used on farms in B.C. include biosolids, effluent, yard waste and wood waste.

Biosolid and Effluent Reuse

Biosolid reuse is defined as the application of municipal waste water treatment system solids such as sewage sludge to farmland. Biosolids add organic matter to the soil and replace nutrients removed by crops. They provide a wide range of macronutrients and micronutrients available to plants. In addition, biosolids can improve soil tilth in their beneficial function as soil conditioners. Any application of biosolids or effluent to farm land must meet the conditions specified in approvals or permits issued under the Environmental Management Act.

Effluent Use for Irrigation

Climatic moisture deficits occur in many parts of British Columbia during the summer months. In these areas, crops must be irrigated to achieve maximum production. Municipal effluent and effluent from food processing plants can be applied to land by irrigation. The Code of Practice for the Use of Reclaimed Water must be followed when applying nutrients of this nature.

Woodwaste

Wood waste is used as a soil or growth amendment for a variety of purposes in the berry and greenhouse industries.

See also Farm Practice: Woodwaste

Yard Waste Compost

Yard waste compost can be used as a soil amendment for a variety of agricultural purposes.

See also Farm Practice: Fertilizers and Soil Conditioners
Nuisance Concerns
The three primary disturbances mentioned in the Farm Practices Protection (Right to Farm) Act are odour, noise and dust. Of particular potential concern to practices surrounding application the use of non-agricultural wastes are odour and dust.

Odour
Farmers engage in a variety of activities that produce odours. Many non-agricultural wastes used as fertilizers or soil conditioners can release some odours. The degree to which individuals perceive an odour to be a nuisance will depend on the frequency, intensity, duration and offensiveness of the odour. Other factors that come into play include a person’s sensitivities and personal previous experiences.

See also Nuisance Reference: Odour

Dust
Dust is defined as fine-grained suspended particulate in air. The degree to which individuals perceive dust to be a nuisance will depend on the frequency, intensity and duration of a dust-generating event. Farmers engage in a variety of activities that require the use of equipment or practices that will create dust. Many non-agricultural waste application activities can create dust. Dust may also be generated as fugitive dust when fine particulates are lifted from fields, roads, buildings and yards via air turbulence.

See also Nuisance Reference: Dust

Activities and Operations

Irrigation
Non-agricultural waste, particularly effluents, should be applied following the principles and best management practices associated with irrigation. Infiltration rate and runoff should be monitored.

See also Farm Practice: Irrigation

Fertilizers and Soil Conditioners
Because effluent contains many nutrients available to plants, irrigation practices should account for such nutrients when applying the effluent to cropland. Similarly, because biosolids and compost products contain plant-available nutrients, farmers should determine crop nutrient requirements when applying such by-products to cropland.

See also Farm Practice: Fertilizers and Soil Conditioners

Legislation
Information on federal and provincial legislation can be found in Appendices B and C. Acts, regulations and bylaws that regulate or may affect non-agricultural waste use practices include, but are not limited to, the following.

Federal Legislation
The Fisheries Act protects fish and fish habitat and prohibits the discharge of deleterious substances into waters frequented by fish.
Provincial Legislation

The *Environmental Management Act* protects the soil, water and air environment from pollution. Included under this Act are the following applicable regulations:

- The *Agricultural Waste Control Regulation* which allows farmers to operate without a waste permit when managing land application of nutrients, crop residues, waste and compost according to the *Code of Agricultural Practice for Waste Management*.

- The *Organic Matter Recycling Regulation* which regulates composting and land application for a range of organic materials. Included are minimum standards to follow when composting or using compost made from non-agricultural wastes.

- The *Mushroom Composting Pollution Prevention Regulation* which deals specifically with the requirements of any mushroom media production facility.

- The *Hazardous Waste Regulation* which provides minimum standards for the handling and disposal of dangerous goods as defined in the regulation, and includes batteries, waste oil, solvents and waste asbestos from buildings.

- The *Municipal Sewage Regulation* and the *Code of Practice for the Use of Reclaimed Water* which regulate the use of reclaimed water.

Publications

Publications that provide further information on non-agricultural waste include, but are not limited to, the following. Refer to Appendix D for details.

*Code of Practice for the Use of Reclaimed Water*

*Land Application Guidelines for the Organic Matter Recycling Regulation and the Soil Amendment Code of Practice*