subsector is separated into seven industrial segments. These include canned and cured fish and seafood; prepared fresh or frozen fish and seafoods; roasted coffee; potato chips, corn chips, and similar snacks; manufactured ice; macaroni, spaghetti, vermicelli, and noodles; and food preparations, not elsewhere classified segments. Three of the seven segments are represented by the part 2 application information (i.e., prepared fresh or frozen fish and seafoods; potato chips, corn chips, and similar snacks; and macaroni, spaghetti, vermicelli, and noodles). Process operations may include shelling, washing, drying, shaping, baking, frying, and seasoning.

- j. Tobacco Products Subsector (SIC Code 21XX). The tobacco products subsector is separated into four segments. These include cigarettes, cigars, chewing and smoking tobacco and snuff, and tobacco stemming and redrying. None of these four segments submitted part 2 application information. Typical process operations may include drying, blending, shaping, cutting and rolling.
- 3. Pollutants in Storm Water Discharges Associated with Food and Kindred Products Processing Facilities.

Typical food and kindred products processing facilities do not conduct many processing operations outdoors.

The nature of the business, and the required sanitary conditions, require that the raw materials through final product be protected from storm water. As such, the contamination of storm water from this sector is primarily from the loading and unloading of products and raw materials, spillage and leaks from tanks and containers stored outdoors, waste management practices, pest control, and improper connections to the storm sewer. Table U-1 lists potential pollutant sources from activities that commonly take place at food and kindred products processing facilities.

TABLE U-1.—DESCRIPTION OF POTENTIAL POLLUTANT SOURCES i, ii, iii

Activity	Pollutant source	Pollutant(s)
A. Raw Material Unloading/Product Loading.	Container defects (bags, drums, bottles, crates) Spills and leaks during unloading/ loading (tanks, rail cars) Failed connections (hoses and couplings) Washdown of unloading/loading area	BOD, TSS, O&G, pH, TKN.
B. Storage Containers: Liquid Storage (i.e., above ground storage tanks).	Failed piping and connections (couplings, flanges, hoses, and valves)	BOD, TSS, O&G, pH.
Liquid Storage (drums, carboys, and gallon jugs).	 External corrosion and structural failure Spills and overflows due to operator error Outside containers Open containers External corrosion of the containers 	BOD, TSS, O&G, pH.
Solid Storage (silos, holding bins, fiber drums, etc.).	Operator handling and transporting Spills and leaks from damaged containers Dust and particulates Operator handling and transporting Spills and leaks	BOD, TSS, pH.
C. Waste Management: Air Emissions	 Oven emissions Vents Fine solids handling	BOD, TSS, O&G, pH.
Solid Waste	Dumpsters and trash cans Spent equipment, scraps, etc.	BOD, TSS, O&G, pH, copper, manganese.
Wastewater	Treatment processes (e.g., hydraulic overflow) Outside piping and connections (couplings, flanges, hoses, valves, and pumps)	BOD, TSS, O&G, pH, fecal coliform.
D. Pest Control: Pesticides, rodenticides, insecticides.	Outside areas of applications	Miscellaneous insecticides, rodenticides, pesticides, etc., TKN.
E. Improper Connections to the Storm Sewer.	Process wastewatersProcess floor drainsSanitary sewersUSTs	BOD, TSS, O&G, pH.

ⁱ "Standard Handbook of Environmental Engineering," Corbitt, Robert A., McGraw-Hill, Inc., 1990.

iii "Environmental Engineering and Sanitation," Fourth Edition, Salvato, Joseph A., John Wiley & Sons, Inc., 1992.

Impacts caused by storm water discharges from food and kindred products processing facilities will vary from facility to facility. Several factors influence to what extent operations at the site can affect water quality. Such factors include: geographic location; hydrogeology; the types of industrial activities exposed to storm water; the size of the operation; the nature of storm water control measures in place; and the type, duration, and intensity of precipitation events. Each of these factors interact to influence the quantity and quality of storm water runoff. For example, flour/oil particulate emissions from vents (e.g., from baking operations) may be a significant source of pollutants

at some facilities, while material storage may be a primary source at others. Similarly, a facility with all storm water from exposed industrial activity diverted to the sanitary sewer would have less of an impact than a facility not practicing this control option. In addition, sources of pollutants other than storm water, such as illicit

[&]quot;Air Pollution Engineering Manual, Air and Waste Management Association, Edited by Anthony J. Buonicore and Wayne T. Davis, Van Nostrand Reinhold, New York, 1992.