APPENDIX A
(Grease Trap Hauler Manifest)
ANYTOWN USA
LIQUID WASTE HAULER MANIFEST
EMERGENCY PHONE NUMBER (615) ___-_____
APPENDIX B
(Example Grease Trap Sizing Formulas)
Example Grease Trap Sizing Formula  
Environmental Biotech Model  
Based on EPA-2 Model

A. Determine maximum drainage flow from fixtures:

<table>
<thead>
<tr>
<th>Type of fixture</th>
<th>Flow rate/per unit</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>China hand sink</td>
<td>15 gpm</td>
<td></td>
</tr>
<tr>
<td>Single compartment sink</td>
<td>20 gpm</td>
<td></td>
</tr>
<tr>
<td>Double compartment sink</td>
<td>25 gpm</td>
<td></td>
</tr>
<tr>
<td>2, single compartment sinks</td>
<td>25 gpm</td>
<td></td>
</tr>
<tr>
<td>2, double compartment sinks</td>
<td>35 gpm</td>
<td></td>
</tr>
<tr>
<td>Triple sink 1 ½ in. drain</td>
<td>35 gpm</td>
<td></td>
</tr>
<tr>
<td>Triple sink 2 in. drain</td>
<td>35 gpm</td>
<td></td>
</tr>
<tr>
<td>30 gal. Dishwasher</td>
<td>15 gpm</td>
<td></td>
</tr>
<tr>
<td>50 gal. Dishwasher</td>
<td>25 gpm</td>
<td></td>
</tr>
<tr>
<td>50-100 gal. dishwasher</td>
<td>40 gpm</td>
<td></td>
</tr>
</tbody>
</table>

B. Total – Divided by no. of fixtures / = gpm (per kitchen)

C. Loading Factors

<table>
<thead>
<tr>
<th>Restaurant type</th>
<th>Fast food-paper delivery = 0.50</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Low volume = 0.50</td>
</tr>
<tr>
<td></td>
<td>Medium volume = 0.75</td>
</tr>
<tr>
<td></td>
<td>High volume = 1.0</td>
</tr>
</tbody>
</table>

D. B x C = sub total

E. Total x 60 min. = max flow for 1 hour

F. x 2 hours retention time = volume of trap in gallons

Chart assumes inclusion of floor drains and lesser fixtures such as soup kettles with intermittent flows.
1. Restaurants:

\[(D) \times (GL) \times (ST) \times (HR/2) \times (LF) = \text{Size of Grease Trap, gallons, where:}\]

- **D** = Number of seats in dining area
- **GL** = Gallons of wastewater per meal, normally 5 gallons
- **ST** = Storage capacity factor ---minimum of 1.7
  - Onsite disposal – 2.5
- **HR** = Number of hours open
- **LF** = Loading factor
  - 1.0 interstate freeways
  - 1.0 recreational areas
  - 0.5 main highways

Minimum size grease trap should be 750 gallons

2. Hospitals, nursing homes, other type commercial kitchens with varied seating capacity:

\[(M) \times (GL) \times (ST) \times (LF) = \text{Size of Grease Trap, gallons, where:}\]

- **M** = Meals per day
- **GL** = Gallons of wastewater per meal, normally 4.5 gallons
- **ST** = Storage capacity factor----minimum of 1.7
  - Onsite disposal – 2.5
- **LF** = Loading factor
  - 1.25 garbage disposal & dishwasher
  - 1.0 without garbage disposal
  - 0.75 without dishwashing
  - 0.5 without dishwashing and garbage disposal

Minimum size grease trap should be 750 gallons
APPENDIX C
(Example Ordinance and Permits for Oil and Grease)
EXAMPLE FOG ORDINANCE

ORDINANCE NO. _______

AN ORDINANCE TO REGULATE ANIMAL AND VEGETABLE FATS, OILS AND GREASE AS WELL AS SOIL/SAND AND LINT TRAPS AND INTERCEPTORS.

BE IT ENACTED BY THE ________________________________ OF THE CITY OF ________________________________, TENNESSEE, THAT: [Or whatever introductory provision, if any, is required by the city’s charter.]

Section 1. Purpose. The purpose of this ordinance is to control discharges into the public sewerage collection system and treatment plant that interfere with the operations or the system, cause blockage and plugging of pipelines, interfere with normal operation of pumps and their controls and contribute waste of a strength or form that is beyond the treatment capability of the treatment plant.

Section 2. Fat, Oil, and Grease (FOG), waste food, and sand interceptors. FOG, waste food and sand interceptors shall be installed when, in the opinion of the Superintendent, they are necessary for the proper handling of liquid wastes containing Fats, Oils, and Grease, ground food waste, sand, soil, and solids, or other harmful ingredients in excessive amounts which impact the wastewater collection system. Such interceptors shall not be required for single family residences, but may be required on multiple family residences. All interceptors shall be of a type and capacity approved by the Superintendent, and shall be located as to be readily and easily accessible for cleaning and inspection.

Section 3. Definitions. In the interpretation and application of this chapter the following words and phrases shall have the indicated meanings:

(1) “Interceptor.” A devise designed and installed to separate and retain for removal, by automatic or manual means, deleterious, hazardous or undesirable matter from normal wastes, while permitting normal sewage or waste to discharge into the drainage system by gravity.

(2) “Grease Trap.” An interceptor whose rated flow exceeds 50 g.p.m. and is located outside the building.

(3) “Grease Interceptor.” An interceptor whose rated flow is 50 g.p.m. or less and is typically located inside the building.

Section 4. Fat, Oil, Grease, and Food Waste. (1) New construction and renovation. Upon construction or renovation, all restaurants, cafeterias, hotels, motels, hospitals, nursing homes, schools, grocery stores, prisons, jails, churches, camps, caterers, manufacturing plants and any other sewer users who discharge applicable waste shall submit a FOG and food waste control plan that will effectively control the discharge of FOG and food waste.

(2) Existing structures. All existing restaurants, cafeterias, hotels, motels, hospitals, nursing homes, schools, grocery stores,
prisons, jails, churches, camps, caterers, manufacturing plants and any other sewer users who discharge applicable waste shall be required to submit a plan for control of FOG and food waste, if and when the Superintendent determines that FOG and food waste are causing excessive loading, plugging, damage or operational problems to structures or equipment in the public sewer system.

(3) Implementation of plan. After approval of the FOG Plan by the Superintendent the sewer user must: implement the plan within a reasonable amount of time; service and maintain the equipment in order to prevent adverse impact upon the sewer collection system and treatment facility. If in the opinion of the Superintendent the user continues to impact the collection system and treatment plant, additional pretreatment measures may be required.

Section 5. Sand, soil, and oil interceptors. All car washes, truck washes, garages, service stations and other sources of sand, soil, and oil shall install effective sand, soil, and oil interceptors. These interceptors will be sized to effectively remove sand, soil, and oil at the expected flow rates. These interceptors will be cleaned on a regular basis to prevent impact upon the wastewater collection and treatment system. Owners whose interceptors are deemed to be ineffective by the Superintendent may be asked to change the cleaning frequency or to increase the size of the interceptors. Owners or operators of washing facilities will prevent the inflow of rainwater into the sanitary sewers.

Section 6. Laundries. Commercial laundries shall be equipped with an interceptor with a wire basket or similar device, removable for cleaning, that prevents passage into the sewer system of solids ½ inch or larger in size such as strings, rags, buttons, or other solids detrimental to the system.

Section 7. Control equipment. The equipment or facilities installed to control FOG, food waste, sand and soil, must be designed in accordance with Southern Plumbing Code and Tennessee Department of Environment and Conservation engineering standards or applicable city guidelines. Underground equipment shall be tightly sealed to prevent inflow of rainwater and easily accessible to allow regular maintenance. Control equipment shall be maintained by the owner or operator of the facility so as to prevent a stoppage of the public sewer, and the accumulation of FOG in the lines, pump stations and treatment plant. If the City is required to clean out the public sewer lines as a result of a stoppage resulting from poorly maintained control equipment, or lack there of, the owner or operator shall be required to refund the labor, equipment, materials and overhead costs to the City. Nothing in this section shall be construed to prohibit or restrict any other remedy the City has under this ordinance, or state or federal law.

The City retains the right to inspect and approve installation of the control equipment.

Section 8. Solvents Prohibited. The use of degreasing or line cleaning products containing petroleum based solvents is prohibited.
Section 9. Enforcement and penalties. Any person who violates this ordinance shall be guilty of a civil violation punishable under and according to the general penalty provision of the City’s municipal code of ordinances. Each day’s violation of this ordinance shall be considered a separate offense.

Section 10. Alteration of Control Methods. The city through the Superintendent reserves the right to request additional control measures if measures taken are shown to be insufficient to protect sewer collection system and treatment plant from interference due to the discharge of fats, oils, and grease, sand/soil, or lint.

Section 11. Each section, subsection, paragraph sentence, and clause of this ordinance, is declared to be separable and severable.

Section 12. [Ordinance publication requirements or other formalities, upon which the legality of the ordinance depends, may be stated here.]

Passed first reading: _______________________________

Passed second reading: _____________________________

______________________________________
(Mayor)

______________________________________
(Recorder)
Sec. 3-8-150. Fat, oil, and grease trap/oil and sand separator/interceptor requirements.

(a) Fat, Oil and Grease (F.O.G.) interceptors required. Users who operate restaurants, cafes, lunch counters, take-outs, cafeterias, bars, clubs, or hotel, hospital, factory or school kitchens or other establishments that serve or prepare food where F.O.G. may be introduced to the sewer system shall have an F.O.G. interceptor. Take-out food establishments or other establishments that prepare food but do not cook in oil or grease and who serve food only in disposable containers may utilize alternative interceptors as approved by the director, provided their discharges will not violate any discharge prohibitions of this article. F.O.G. interceptors may also be required in non-cooking or cold dairy and frozen foodstuff establishments when they are deemed necessary by the director.

(b) Oil and sand interceptors required. Users who operate automatic and coin operated laundries, car washes, filling stations, commercial garages or similar businesses having any type of washing facilities or grease racks and any other users producing grit, sand, oils or other materials which may have the potential of causing partial or complete obstruction of the building sewer or other areas in the sewer system shall install interceptors approved by the director.

(c) Location of interceptors. All interceptors shall be located outside the building in such a manner that personnel from CCU can inspect the interceptors at any time.

(d) Size of interceptors. All interceptors shall be sized to ensure that the county’s sewer system is protected from excessive F.O.G., sand and oil which may cause clogging or damage and that the user is capable of meeting all discharge requirements. F.O.G. interceptors shall be based on Chapter 10 of the Florida Building Code, as amended.

(e) Sampling port. A sampling port shall be installed in an approved location to allow sampling by the utility and the user. The sample port shall be located between the interceptor and the discharge point to the sewer system.

(f) Access manholes. An access manhole must have a minimum diameter of 24 inches and shall be provided over each chamber and sanitary tee. The access manholes shall extend at least to the finished grade and be designed and maintained to prevent water inflow or infiltration. The manholes shall have readily removable covers to facilitate inspection and cleaning.

(g) Plans required. The following must be submitted to CCU for review and approval prior to installation of an interceptor.

1. site plans showing the location of the interceptor, lines, clean out or manhole and sample port;
2. details of the interceptor, lines, clean out or manhole and sample port; and
3. formula and calculation used to determine the interceptor capacity.

Note: No non-grease-laden sources are allowed to be connected to sewer lines intended for grease, oil and sand separators.

(h) Existing interceptors. All interceptors currently in use or in existence at the time of this article will be considered sized sufficiently provided they meet all discharge requirements as stated in this article. All new interceptors or interceptors to replace or upgrade existing interceptors will be required to meet all criteria stated in this division.

(i) Inspections. When upon inspection the interceptor is found to have six inches or more of solids in the bottom of the interceptor (using a Sludge Judge) or a grease cap of three inches or more, or the establishment exceeds discharge compliance levels, the director can require
a grease pump out. Upon completion of an on-site inspection or analytical results of
sampling indicate a violation of this article, the director may issue a .Notice of Violation. to the
user or representative to document any discrepancies, non-compliance, special
instructions or other guidance identified during the on-site inspection.
(j) Maintenance.
(1) The user of the premises or business where such interceptor is located shall
obtain from CCU a maintenance card which shall be posted in a conspicuous manner
showing proof of regular maintenance. Such card shall be obtained annually and shall be
presented upon request. All records pertaining to the maintenance of an interceptor shall be
retained by the user for a period
of not less than three years and available to CCU upon request.
(2) Every F.O.G. interceptor shall be cleaned every 90 days or sooner, if needed.
An exemption may be granted to the 90-day minimum requirement if the user can establish
that such maintenance schedule is not necessary.
(k) Alternative treatments. The use of any Free-Enzyme, Chemical, or other products
designed to emulsify, liquefy or further render grease soluble for the purpose of clearing
drains or circumventing the design of the interceptor is prohibited. All products claiming
biological activity must be approved by the director. Approval for this or any other treatment
does not relieve the user
of properly maintaining the interceptor as to prevent discharge violations to occur. Failure to
comply with this section shall subject the user to appropriate enforcement, fines, and
procedures as set forth in this article. Additionally, if any person fails to comply with this
section and said failure results in damage to the county's system, the county shall be entitled
to recover the cost of repair of the system from said person and any fines or penalties
assessed against the county as a result of such failure.
Town of Cary
Section 19-104. FATS, OILS, AND GREASES CONTROL ORDINANCE
Adopted by Town Council: December 10, 1998
Effective Date: January 1, 1999

A. Scope and Purpose
To aid in the prevention of sanitary sewer blockages and obstructions from contribution and accumulation of fats, oils, and greases into such sewer system from industrial or commercial establishments, particularly food preparation and serving facilities.

B. Definitions
1. Fats, Oils, and Greases. Organic polar compounds derived from animal and/or plant sources that contain multiple carbon chain triglyceride molecules. These substances are detectable and measurable using analytical test procedures established in 40 CFR 136, as may be amended from time to time. All are sometimes referred to herein as “Grease” or “Greases”.

2. Grease Trap or Interceptor. A device for separating and retaining waterborne Greases and Grease complexes prior to the wastewater exiting the trap and entering the sanitary sewer collection and treatment system. These devices also serve to collect settlable solids, generated by and from food preparation activities, prior to the water exiting the trap and entering the sanitary sewer collection and treatment system. Grease Traps and Interceptors are sometimes referred to herein as “Grease Interceptors”.

3. Cooking Establishments. Those establishments primarily engaged in activities of preparing, serving, or otherwise making available for consumption foodstuffs and that use one or more of the following preparation activities: cooking by frying (all methods), baking (all methods), grilling, sautéing, rotisserie cooking, broiling (all methods), boiling, blanching, roasting, toasting, or poaching. Also included are infrared heating, searing, barbecuing, and any other food preparation activity that produces a hot, non-drinkable food product in or on a receptacle that requires washing.

4. Non-Cooking Establishments. Those establishments primarily engaged in the preparation of precooked foodstuffs that do not include any form of cooking. These include cold dairy and frozen foodstuffs preparation and serving establishments.

5. Minimum Design Capability. The design features of a Grease Interceptor and its ability or volume required to effectively intercept and retain Greases from grease-laden wastewaters discharged to the public sanitary sewer.

6. User. Any person, including those located outside the jurisdictional
limits of the Town, who contributes, causes or permits the contribution or
discharge of wastewater into the POTW, including persons who contribute
such wastewater from mobile sources, such as those who discharge
hauled wastewater.

C. Grease Interceptor Maintenance, Record Keeping, and Grease Removal
1. Grease Interceptors shall be installed by Users as required by the
Director or his designee. Grease Interceptors shall be installed at the
User’s expense, when such User operates a Cooking Establishment.
Grease Interceptors may also be required in non-cooking or cold dairy and
frozen foodstuffs establishments and other industrial or commercial
establishments when they are deemed necessary by the Director for the
proper handling of liquid wastes containing Grease. No User shall allow
wastewater discharge concentration from subject Grease Interceptor to
exceed 325 milligrams per liter, as identified by method EPA Method 1664
or 275 milligrams per liter, as identified by EPA method 413. All Grease
Interceptors shall be of a type, design, and capacity approved by the
Director or his designee and shall be readily and easily accessible for User
cleaning and Town inspection. All such Grease Interceptors shall be
serviced and emptied of accumulated waste content as required in order to
maintain Minimum Design Capability or effective volume of the Grease
Interceptor, but not less often than every thirty (30) days. Users who are
required to pass water through a Grease Interceptor shall:

a. Provide for a minimum hydraulic retention time of twenty-four (24)
minutes at actual peak flow or 12 minutes at the calculated theoretical peak
flow rate as predicted by the Uniform Plumbing Code fixture criteria,
between the influent and effluent baffles with twenty (20) percent of the
total volume of the Grease Interceptor being allowed for sludge to settle
and accumulate, identified hereafter as a “sludge pocket”.

b. Remove any accumulated Grease cap and sludge pocket as required,
but at intervals of not longer than thirty (30) days at the Users expense.
Grease Interceptors shall be kept free of inorganic solid materials such as
grit, rocks, gravel, sand, eating utensils, cigarettes, shells, towels, rags,
etc., which could settle into this pocket and thereby reduce the effective
volume of the Grease Interceptor.

c. Accept the following conditions: If any skimmed or pumped wastes
or other materials removed from Grease Interceptor are treated in any
fashion onsite and reintroduced back into the Grease Interceptor as an
activity of and after said onsite treatment, the User shall be responsible for
the attainment of established Grease numerical limit consistent with and
contained in (C)(1) on all discharges of wastewater from said Grease
Interceptor into the Town of Cary sanitary sewer collection and treatment
system.

d. Operate the Grease Interceptor in a manner so as to maintain said
device such that attainment of the grease limit is consistently achieved.
“Consistent” shall mean any wastewater sample taken from said Grease Interceptor shall be subject to terms of numerical limit attainment described in (C)(1). If an establishment desires, because of documented space constraints, an alternate to an out-of-building Grease Interceptor, the request for an alternative location shall contain the following information:

i. Location of Town sewer main and easement in relation to available exterior space outside building

ii. Existing plumbing at or in a site that uses common plumbing for all services at that site.

e. Understand and agree that: The use of biological additives as a Grease degradation agent is conditionally permissible, upon prior written approval by the Director. Any establishment using this method of Grease abatement shall maintain the trap or interceptor in such a manner that attainment of the Grease wastewater discharge limit, as measured from the trap’s outlet, is consistently achieved.

f. Understand and agree that: The use of automatic Grease removal systems is conditionally permissible, upon prior written approval by the Director, the Lead Plumbing Inspector of the Town of Cary, and the Wake County Department of Health. Any establishment using this equipment shall operate the system in such a manner that attainment of the Grease wastewater discharge limit, as measured from the unit’s outlet, is consistently achieved.

g. Understand and agree that: The Director reserves the right to make determinations of Grease Interceptor adequacy and need, based on review of all relevant information regarding Grease Interceptor performance, facility site and building plan review and to require repairs to, or modification or replacement of such traps.

2. The User shall maintain a written record of trap maintenance for three (3) years. All such records will be available for inspection by the Town at all times.

3. No non-grease-laden sources are allowed to be connected to sewer lines intended for Grease Interceptor service.

4. Except as provided herein, for a period of one year following adoption of this Ordinance, although installation of Grease Interceptors will be required to be installed, no enforcement actions will be taken under this Ordinance for failure to achieve limits on Grease discharges from Grease Interceptors. If, during this one year period an obstruction of a Town sewer main(s) occurs that causes a sewer overflow to the extent that an impact on the environment is realized and that said overflow or failure of the sanitary sewer collection system to convey sewage can be attributed in
part or in whole to an accumulation of Grease in the Town’s sewer main(s), the Town of Cary will take appropriate enforcement actions, as stipulated in the Town’s Industrial Pretreatment Enforcement Plan and Sewer Use Ordinance, against the generator or contributor of such Grease.

5. Access manholes, with a minimum diameter of 24 inches, shall be provided over each chamber and sanitary tee. The access manholes shall extend at least to finished grade and be designed and maintained to prevent water inflow or infiltration. The manholes shall also have readily removable covers to facilitate inspection, Grease removal, and wastewater sampling activities.
I. PURPOSE OF THE GREASE CONTROL PROGRAM
Grease is one of the primary causes of stoppages, backups, and overflows in a wastewater collection system. Grease buildup in the sewers also causes restrictions and capacity problems. KUB’s goal is to improve sewer service by reducing the impact of grease. This goal will be achieved through two related programs:
A. Preventive Maintenance Program
KUB’s “field control” program, through which identified grease problem areas” are routinely cleaned and inspected. KUB is responsible for the “field control” of grease, through its normal collection system operations.

B. Grease Control Program
KUB’s “source control” program, through which Food Service Facilities (FSF’s) are required to capture and properly dispose of the grease generated by their operation. The focus of this document is the Grease Control Program, including the proper sizing, installation, and maintenance of grease interceptors. The administrative and inspection requirements are established as well. Through the cooperative efforts of FSF’s with KUB, the goal of improved sewer service through proper grease control can be achieved.

II. DEFINITIONS
Unless otherwise expressly stated or the context clearly indicates a different intention, the following terms shall, for the purpose of this document, have the meanings indicated in this section:
A. Black Water
Waste water from sanitary fixtures such as toilets and urinals.
B. Bulk Service Kitchen
A facility which prepares bulk quantities of food, such as hospitals, schools, or caterers.
C. Common Grease Interceptor
A device to which grease wastes are directed from more than one facility having different operators or type of operations, such as in a Food Court.
D. Customer
A user of the sanitary sewer system who produces wastes from their process operations. The customer is responsible for assuring that the produced waste is disposed of in accordance with all Federal, State and local disposal regulations.
E. Food Courts
Areas predominantly found in shopping centers or amusement parks and festivals where several food preparation establishments having different owners may be sharing seating space and/or plumbing facilities.
F. Food Service Facility (FSF)
Any facility, which cuts, cooks, bakes, prepares, or serves food, or which disposes of food related wastes.
G. Garbage Grinder
A device which shreds or grinds up solid or semisolid waste materials into smaller portions for discharge into the sanitary sewer collection system.
H. Gray Water
Refers to all wastewater other than “Black Water” as defined in this section.
I. Grease
A material composed primarily of fats, oil, and grease from animal or vegetable sources. The terms fats, oil, and grease shall be deemed as Grease by definition. Grease does not include petroleum-based products.
J. Grease Interceptor
A large tank or device so constructed as to separate and trap or hold fats, oil, and grease substances from the sewage discharged from a facility in order to keep fats, oil, and grease substances from entering the sanitary sewer collection system. Grease Interceptors are located outside of food service facilities.
K. Hauler
One who transfers waste from the site of a customer to an approved site for disposal or treatment. The hauler is responsible for assuring that all Federal, State and local regulations are followed regarding waste transport.

L. NPDES
Stands for National Pollution Discharge Elimination System under which the KUB’s Wastewater Treatment Plants are permitted.

M. POTW
Stands for Publicly-Owned Treatment Works or “Treatment Works” as defined by Section 212 of the Clean Water Act (33 U.S.C. § 1292) which is owned or operated in this instance by the KUB. This definition includes any sewers that convey wastewater to KUB’s sewage treatment plants.

N. Pretreatment Coordinator
An individual employed by KUB who is charged with the responsibility of administering the provisions of the pretreatment program to ensure compliance by users with applicable laws, rules, regulations, resolutions and ordinances relative to the concentration(s) of substances found in the waste stream of facilities connected to the POTW.

O. Sewage
The liquid and water-carried domestic or industrial wastes from dwellings, commercial establishments, industrial facilities, and institutions, whether treated or untreated. The terms “waste” and “wastewater” shall be deemed as Sewage by definition.

P. Sewer Lateral
A sewer line or lines maintained and controlled by private persons for the purpose of conveying sewage from the waste producing location to the public sanitary sewer collection system.

Q. Single Service Restaurant
A restaurant where the meals are served on throwaway plates and utensils.

R. Standard Restaurant
A restaurant where meals are served on plates and utensils that are washed and re-used.

S. “Under the Sink” Grease Trap
A device placed under or in close proximity to sinks or other facilities likely to discharge grease in an attempt to separate, trap or hold, oil and grease substances to prevent their entry into the sanitary sewer collection system. Grease Traps are commonly referred to based on their grease retention capacity, i.e. 20#, 30#, 40#, etc.

T. User
Shall mean a KUB customer operating a “food service facility” inside the KUB wastewater service area.

U. Waste
The liquid and water-carried domestic or industrial wastes from dwellings, commercial establishments, industrial facilities, and institutions, whether treated or untreated. Wastes may include but not be limited to, discharges from scullery sinks, pot and pan sinks, dishwashing machines, soup kettles, and floor drains located in areas where grease-containing materials may exist. The terms “sewage” and “wastewater” shall be deemed as Waste by definition.
III. GENERAL CRITERIA

A. Installation Requirements for New Food Service Facilities. All proposed or newly remodeled food service facilities inside the KUB Wastewater Service area shall be required to install an approved, properly operated and maintained grease interceptor.

B. Phased Implementation Plan for Existing Food Service Facilities. All existing food service facilities inside the KUB Wastewater Service area are expected to conduct their operations in such a manner that grease is captured on the user’s premises and then properly disposed of. Existing Food Service Facilities will typically be handled under KUB’s Grease Control Program.

1) KUB will periodically inspect each Food Service Facility on an as-needed basis to assure that each facility is complying with the intent of the Grease Control Program. KUB’s goal is to achieve compliance by all existing Food Service Facilities by January 1, 2003.

2) Through preventive maintenance records or emergency calls related to grease, KUB will identify and target “grease problem areas” in the waste water collection system. Food Service Facilities located upstream of these problem areas and discharge their waste water into the “problem” lines will be identified as potential contributors to the grease build-up. KUB inspects the grease interceptors of all food service facilities in the vicinity of the “problem area”, making note of maintenance records, sizing, and condition.

3) Each Food Service Facility in the vicinity of the problem area will be inspected. The facilities’ grease control practices and the adequacy of their grease control interceptor/equipment will be assessed. Maintenance records will also be reviewed.

4) Following the inspections, KUB will send written notice to the inspected food service facilities, containing an educational brochure on grease in the sewer system, a summary of the policy requirements, and the results of the inspection. The inspections will typically result in one of the following actions:

a) Facilities equipped with an appropriate and adequately-sized grease interceptor who are meeting the intent of the Grease Control Program through effective grease control practices will be commended for their compliance.

b) Facilities may be required to develop and submit to KUB a proposed plan designed to achieve compliance through improved housekeeping and increased maintenance and pumping on the existing grease interceptor/equipment.

c) Facilities that are not successful in achieving compliance with the intent of the Grease Control Program through improved housekeeping and increased maintenance and pumping on the existing grease interceptor/equipment will be required to install the necessary interceptor/equipment to bring the facility into compliance. An appropriate amount of time will be agreed upon between KUB and the Customer.

C. Prohibited Discharges. Black water shall not be discharged to the grease interceptor unless specifically approved, in writing, by KUB.

D. Floor Drains. Only floor drains which discharge or have the potential to discharge grease shall be connected to a grease interceptor.

E. Garbage Grinders and Dishwashers. KUB recommends that solid food waste products be disposed of through normal solid waste/garbage disposal procedures. The use of garbage grinders which discharge to the sanitary sewer is discouraged within the KUB wastewater service area but in the event that the device is used in a commercial or industrial facility, it must be connected to the grease interceptor. The use of a garbage grinder decreases the operational capacity of the grease interceptor and will require an increased pumping frequency to ensure continuous and effective operation.
Commercial dishwasher connections must be connected to the grease interceptor. Food particles from garbage grinders take up storage capacity in the grease interceptor and will require that the interceptor be pumped more frequently. Dishwashers discharge hot water and soap, which can melt grease stored in an overburdened interceptor. Melted grease may then pass through the interceptor into the customer’s service line and the public sewer system, where the grease hardens and causes line clogs.

1) Although not recommended, existing food service facilities may allow any fixture to remain connected to a grease interceptor, except fixtures which may discharge black water.
2) Proposed and remodeled food service facilities may not connect janitor sinks or black water fixtures to a grease interceptor.

F. Location

1) Each grease trap and grease interceptor shall be installed and connected so that it is easily accessible for inspection, cleaning, and removal of the intercepted grease at any time. A grease interceptor may not be installed in any part of a building unless approved in writing by KUB.
2) Location of grease interceptors shall meet the approval of KUB. The best location is in an area outside of an outside wall, but upstream from the black water drain line(s).

IV. DESIGN CRITERIA

A. Construction of Interceptors. Grease interceptors shall be constructed in accordance with KUB’s standards and shall have a minimum of two compartments with fittings designed for grease retention. All grease removal devices or technologies shall be subject to the written approval of KUB. Such approval shall be based on demonstrated removal efficiencies of the proposed technology. KUB’s standard drawing for grease interceptors is shown in Appendix A.

B. Access. Access to grease traps and grease interceptors shall be available at all times, to allow for their maintenance and inspection. Access to grease interceptors shall be provided by 2 (two) manholes terminating 1-inch above finished grade with cast iron frame and cover.

C. Load-Bearing Capacity. In areas where additional weight loads may exist, the grease interceptor shall be designed to have adequate load-bearing capacity (example: vehicular traffic in parking or driving areas).

D. Inlet and Outlet Piping. Wastewater discharging to a grease trap or grease interceptor shall enter only through the inlet pipe of the interceptor. Each grease interceptor shall have only one inlet and one outlet pipe.

E. Interceptor Sizing. The required size of a grease interceptor shall be approximated by using the KUB Grease Interceptor Sizing formula shown in Appendix B. Most grease interceptors will have a capacity of not less than 1,000 gallons nor exceed a capacity of 3,000 gallons. If the calculated capacity using the KUB Grease Interceptor sizing formula exceeds 3,000 gallons, multiple units in series shall be installed

See Appendix B for example of formula

Grease interceptor designs represent minimum standards for normal usage. Installations with heavier usage require more stringent measures for which the user is responsible and shall pay the costs to provide additional measures if required by KUB. KUB reserves the right to evaluate interceptor sizing on an individual basis for facilities with special conditions, such as highly variable flows, high levels of grease discharge, or other unusual situations that are not adequately addressed by the formula.
V. GREASE TRAP AND INTERCEPTOR MAINTENANCE
A. Cleaning/Pumping. The user at the user’s expense shall maintain all grease traps and interceptors. Maintenance of “under the sink” grease traps shall include the removal of all fats, oil, and grease from the detention compartment of the trap. Removal is usually accomplished by hand-dipping or scooping the collected grease from the trap. Maintenance of grease interceptors shall include the complete removal of all contents, including floating materials, wastewater, and bottom sludges and solids. Decanting or discharging of removed waste back into the interceptor from which the waste was removed or any other grease interceptor, for the purpose of reducing the volume to be disposed, is prohibited.

B. Cleaning/Pumping Frequency. “Under the sink” grease traps must be cleaned no less than weekly. If grease traps are more than 50% full when cleaned weekly, the frequency shall be increased. Grease interceptors must be pumped out completely a minimum of once every three months, or more frequently as needed to prevent carry over of grease into the sanitary sewer collection system, unless it can be demonstrated to KUB that the pumping frequency can be extended past the three month period.

C. Disposal of Grease Interceptor Waste. All waste removed from each grease interceptor must be disposed of at a facility approved by KUB to receive such waste in accordance with the provisions of this program. In no way shall the pumpage be returned to any private or public portion of the sanitary sewer collection system.

D. Additives. Any additive(s) placed into the grease interceptor or building discharge line system on a constant, regular, or scheduled basis shall be reported to KUB. Such additives shall include, but not be limited to, enzymes, commercially available bacteria, or other additives designed to absorb, purge, consume, treat, or otherwise eliminate fats, oils, and grease. The use of additives shall in no way be considered as a substitution to the maintenance procedures required herein.

E. Chemical Treatment. Chemical treatments such as drain cleaners, acid and other chemicals designed to dissolve or remove grease shall not be allowed to enter the grease interceptor.

F. Manifest. All pumpage from grease interceptors must be tracked by a manifest, which confirms pumping, hauling, and disposal of waste. The customer must obtain a copy of the original manifest from the hauler. The original manifest with original signatures must be left at the disposal facility. The customer is required to utilize only KUB permitted haulers for the disposal of grease.

G. Maintenance Log. A Grease Interceptor Cleaning Record Maintenance Log indicating each pumping for the previous 24 months shall be maintained by each FSF. This log shall include the date, time, amount pumped, hauler, and disposal site and shall be kept in a conspicuous location for inspection. Said log shall be made immediately available to the KUB representative upon request.

VI. ADMINISTRATIVE REQUIREMENTS
A. Initial Data Acquisition. Upon inspection of each FSF, KUB’s inspector shall collect the necessary Grease Control data to facilitate the population of KUB’s Grease Control Program database. The database will be updated with additional or modified information after each inspection.

B. Administrative Fee. An administrative fee for facilities with grease discharges shall be set by KUB. The fee shall be established to insure full cost recovery and shall include but not be limited to the cost of field, administrative, engineering, and clerical expenses involved. The
fees shall be not less than $75.00 per year for each facility. The annual administrative fee shall be applied to the customer’s July Water & sewer service bill and be paid in accordance with KUB’s current “Wastewater Control Division – Schedule “C”, effective July 1, 2002.

C. Monitoring. As a condition for service, the user shall provide, operate, and maintain, at user’s expense, safe and accessible monitoring facilities (such as a suitable manhole) at all times to allow observation, inspection, sampling, and flow measurement of the building sewer or internal drainage systems. There shall be ample room in or near such monitoring facility to allow accurate sampling and preparation of samples for analysis. When the physical location and hydraulic conditions are suitable, a manhole or similar facility existing on the sanitary sewer collection system may be utilized as the user’s manhole when agreed to by both the user and KUB.

D. Inspection and Entry. Authorized personnel of KUB, bearing proper credentials and identification, shall have the right to enter upon all properties subject to this program, at any time and without prior notification, for the purpose of inspection, observation, measurement, sampling, testing or record review, in accordance with this program.

VII. ENFORCEMENT

KUB shall have the administrative authority to enforce this program. Whenever KUB finds that any user has violated or is violating this program, or any prohibition, limitation, or requirements contained herein, KUB will initiate corrective action, which may include but not be limited to the following:

A. Notice of Violation. KUB may issue any user a written notice stating the nature of violation. Within fifteen (15) days of the date of notice, a plan for the satisfactory correction thereof shall be submitted to KUB by the user.

B. Consent Order. KUB may enter into consent orders, assurances of voluntary compliance, or other similar documents establishing an agreement with the user responsible for noncompliance. Such orders will include specific action to be taken by the user to correct the noncompliance with a time period specified by the order.

C. Administrative Order. When KUB finds that a user has violated or continues to violate the provisions set forth in this program, or the order issued thereunder, KUB may issue an order for compliance to the user responsible for the discharge. Orders may contain any requirements as might be reasonable, necessary, and appropriate to address the noncompliance, including but not be limited to the installation of pretreatment technology, additional self-monitoring, and management practices.

D. Emergency Suspension of Services. KUB may suspend water or sewer service when such suspension is necessary, in the opinion of KUB, in order to stop an actual or threatened discharge which:

1) presents or may present an imminent or substantial endangerment to the health or welfare of persons or the environment;
2) causes stoppages, sanitary sewer overflows, or excessive maintenance to be performed to prevent stoppages in the sanitary sewer collection system;
3) causes interference to the POTW; or
4) causes KUB to violate any condition of its NPDES permits

Any person notified of a suspension of the water or sewer service shall immediately stop or eliminate the discharge. In the event of a failure of the person to comply voluntarily with the suspension order, KUB shall take such steps as deemed necessary, including immediate termination of water or sewer service, to prevent or minimize damage to the POTW system or sewer connection or endangerment to any individuals. KUB shall reinstate the water or sewer
service when such conditions causing the suspension have been eliminated and the reconnection fee paid. A detailed written statement submitted by the user describing the cause(s) of the harmful discharge and the measure(s) taken to prevent any future occurrence shall be submitted to KUB within fifteen (15) days of the date of occurrence.

**E. Administrative Penalty.** Notwithstanding any other remedies or procedures available to KUB, any user who is found to have violated any provision of this program, or any order issued hereunder, may be assessed an administrative penalty of not to exceed one thousand dollars ($1,000) per violation. Each day on which noncompliance shall occur or continue shall be deemed a separate and distinct violation. Such assessment may be added to the user's next scheduled sewer service charge and KUB shall have such other collection remedies as are available by law.

**F. Request for Hearing and Appeal.** Any person affected by a penalty, order, or directive of KUB issued pursuant to this program may, within ten (10) days of the issuance of such penalty, order, or directive, request a hearing in writing before KUB to show cause why such should be modified or made to not apply to such person. The requested hearing shall be held as soon as practical after receiving the request, at which time the person affected shall have an opportunity to be heard. At the conclusion of the hearing, KUB shall issue a written response to the person requesting the hearing affirming, modifying, or rescinding the penalty, order, or directive at issue.

---

**APPENDICES**

**APPENDIX A**

**APPENDIX B**

Recommended Grease Interceptor Sizing
Formula Based on EPA-2 Model

*Note: If no cooking/frying occurs and FSF engages in food prep only then use adequately sized 20, 30, 40 pound grease trap; based on flow per current adopted plumbing code.*

<table>
<thead>
<tr>
<th>Restaurant Fixture</th>
<th>Flow Rate</th>
<th>No. of Fixtures</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Restaurant kitchen sink</td>
<td>15 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Single compartment sink</td>
<td>20 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Double compartment sink</td>
<td>25 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2, single compartment sinks</td>
<td>25 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2, double compartment sinks</td>
<td>35 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Triple sink, 1 1/2 or 2 in. drain</td>
<td>35 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Trash can washing station</td>
<td>35 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>30 gal. Dishwasher</td>
<td>15 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>50 gal. Dishwasher</td>
<td>25 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>50-100 gal. Dishwasher</td>
<td>40 gpm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Garbage disposal</td>
<td>40 gpm</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Totals:**

**Note** Calculate average flow rate per fixture

A. Average Flow rate _____ gpm / Number of fixtures _____ = _____ gpm

**Restaurant Type and Sizing Factors:**

- Fast food (no dishes) = .50
- Dine-in (0-100 seats) = .50
- Dine-in (>100 seats) = .60
Cafeteria-Buffet = .75
Food Production = .85

B. Sub Total = A X Sizing Factor, _____ gpm X _____ Factor = _____ gpm
C. Sub Total = B X 60 min. = avg. flow for 1 hour = _____ X 60 = _____ gph
D. Total = C x 2 hrs retention time = trap volume = _____ X 2 = _____ gal
Note: Please read all attached instructions prior to completing this application.

SECTION A - GENERAL INFORMATION

1. Company Name: _______________________________________________________________

   a. Facility Name: ______________________________________________________________

   b. Corporate Owner, if different: _______________________________________________

2. Facility Address:

   Street: ______________________________________________________________________

   City: ________________________ State: ___________  Zip: _________

3. Business Mailing Address:

   Street or P.O. Box: ____________________________________________________________

   City: ________________________ State: ___________  Zip: _________

4. Designated signatory authority of the facility:
   (Attach similar information for each authorized representative)

   Name: ______________________________________________________________________

   Title: ______________________________________________________________________

   Address: _____________________________________________________________________

   City: ________________________ State: ___________  Zip: _________

   Phone: ______________________________________________________________________

5. Designated facility contact:

   Name: ______________________________________________________________________

   Title: ______________________________________________________________________

   Phone: ______________________________________________________________________
SECTION B. - WATER SUPPLY

1. Name as it appears on the water bill: _________________________________________________
   Additional Name, if applicable: ________________________________________________________
   Street:  _______________________________________________________________
   City:  _________________ State: _________________ Zip: _________

2. Water Service Account Number(s): _____________________________________________
   _______________________________________________
   _______________________________________________
   _______________________________________________

3. Attach a copy of last water bill.

SECTION C - WASTEWATER DISCHARGE INFORMATION

1. Wastestream Classification Sheet (WCS) - Use the attached blank template to describe each wastestream in relation to the grease interceptor at your facility. Please refer to the attached pages for instructions and examples.

2. Are any changes or expansions planned during the next three years that could alter wastewater volumes or characteristics? Consider expansion and any other significant wastewater volume increases.
   [ ] Yes
   [ ] No (If No, skip question 9)

3. Briefly describe these changes and their effects on the wastewater volume and characteristics: (Attach additional sheets if needed.)
   _____________________________________________________________________________
   _____________________________________________________________________________
   _____________________________________________________________________________
   _____________________________________________________________________________

SECTION D - TREATMENT

1. Does your facility have a grease interceptor or fixture traps?
   [ ] Yes
   [ ] No If No, please skip to the next section
2. List the location, size, and specifications for all grease interceptors at your facility?

<table>
<thead>
<tr>
<th>Location</th>
<th>Size</th>
<th>Additional Specifications</th>
<th>Type (Circle One)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td>Grease Interceptor / Fixture Trap</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Grease Interceptor / Fixture Trap</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Grease Interceptor / Fixture Trap</td>
</tr>
</tbody>
</table>

3. Are these grease interceptors serviced regularly (i.e. pumped on, at least, a quarterly basis)?

- [ ] Yes
- [ ] No

How often are they serviced?

<table>
<thead>
<tr>
<th>Location</th>
<th>Service Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
</tbody>
</table>

4. Are there additives placed into the grease interceptor (i.e. enzymes, bacteria, etc.)?

- [ ] Yes
- [ ] No

How often are they added to the interceptor?

<table>
<thead>
<tr>
<th>Location</th>
<th>Additive Frequency</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
</tbody>
</table>

List all additives used?

<table>
<thead>
<tr>
<th>Location</th>
<th>Additive Name</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
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<tr>
<td></td>
<td></td>
</tr>
</tbody>
</table>
SECTION E - FACILITY OPERATIONAL CHARACTERISTICS

1. Shift information

<table>
<thead>
<tr>
<th>Work Days</th>
<th>Mon</th>
<th>Tues</th>
<th>Wed</th>
<th>Thurs</th>
<th>Fri</th>
<th>Sat</th>
<th>Sun</th>
</tr>
</thead>
<tbody>
<tr>
<td>Shifts worked per day:</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Employees Per Shift - 1st</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2nd</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3rd</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

2. List all major equipment used for food preparation at your restaurant (i.e. grills, fryers, dishwashers, sinks etc.):

<table>
<thead>
<tr>
<th>Type</th>
<th>Size / Specifications</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
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<tr>
<td></td>
<td></td>
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</tr>
<tr>
<td></td>
<td></td>
</tr>
</tbody>
</table>

3. Provide a copy of the indoor and outdoor plumbing floor diagrams, which should include the location of all water meters, facility sewer connections, grease interceptors, sinks, floor drains, dishwashers, restrooms, etc. If no professional drawing exists a hand drawn copy in the format of the attached example is acceptable.

A blueprint of the facility showing the above items may also be attached.

SECTION F - CONFIDENTIAL BUSINESS INFORMATION

All Information contained in this Application and corresponding Wastewater Discharge Permit are considered Public Information and is available to any member of the public upon request. All effluent data collected or submitted shall be made available to the public without restriction.

Confidential information is information that is considered proprietary, trade secrets, or have an adverse impact on a business advantage should it be divulged. Any information that is considered confidential will be handled as such and kept in our records department under separate cover and is not available to the public.

In order to claim information as confidential, the following criteria must be met and approved by MSD.

- A separate sheet with the requested information shall be submitted for each question that you are asserting as confidential.
- The submittal shall be clearly marked as confidential.
- Submit with the application a separate statement for each question that you are requesting confidentiality indicating the reasons that you are asserting the information as confidential.

You will be notified if MSD does not feel the information requested meets the criteria for confidentiality.

SECTION G - AUTHORIZED SIGNATURES
Compliance Certification:

1. Are all applicable Federal, State, and local pretreatment standards and requirements being met on a consistent basis?

   [ ] Yes
   [ ] No
   [ ] Not Sure

2. If No:

   a. What additional operations and maintenance procedures are being considered to bring the facility into compliance? Also, list additional treatment technology or practice being considered in order to bring the facility into compliance.

   b. Provide a schedule for bringing the facility into compliance. Specify major events planned along with reasonable completion dates. Note that if MSD issues a permit to the applicant, it may require the completion of a schedule for compliance different from the one submitted by the facility.

Milestone Activity | Completion Date
____________________ | ______________________
____________________ | ______________________

Authorized Representative Statement:

I certify under penalty of law that this document and all its attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine or imprisonment for knowing violations.

____________________ | ______________________
Name | Title

____________________ | ______________________
Signature | Date | Phone
Louisville, KY

RE: Issuance of General Discharge Permit No.

Dear:

Your application for a wastewater discharge permit has been reviewed and processed in accordance with MSD’s Wastewater Discharge Regulations (WDR).

The enclosed General Wastewater Discharge Permit No. covers the wastewater discharged from the facility located at into MSD’s collection system. This permit requires monitoring and servicing of your grease interceptor and reporting to MSD (i.e. pumping receipts) on a quarterly basis. This permit becomes effective on and will expire at midnight.

If you wish to appeal or challenge any conditions imposed in permit no., a petition shall be filed for modification or reissuance within 10 days of its receipt. Failure to petition for reconsideration within the allotted time is deemed a waiver by the permittee of his right to challenge the terms of permit no.

Sincerely,

John C. Beyke, PE, PLS
Director of Engineering

JCB:

Enclosures
LOUISVILLE & JEFFERSON COUNTY
METROPOLITAN SEWER DISTRICT
GENERAL DISCHARGE PERMIT NO.

AUTHORITY & APPLICABILITY

This permit (and any attachments), is issued pursuant to the MSD Wastewater Discharge Regulations (WDR) which are made a part hereof by reference thereto as if fully written herein, all provisions of which shall apply to the permittee. This permit was developed from information contained in the Wastewater Discharge Application/Baseline Monitoring Report (BMR). Any condition not disclosed in the Application/BMR or the Wastestream Classification Sheet (WCS) is not included as part of this permit.

Facility Identification

Company Name

Restaurant Name

Restaurant Address

Effective Period

This permit shall become effective and shall supersede any previous permits issued by MSD.

This permit shall expire at midnight unless modified or revoked by MSD. MSD may modify or revoke this permit at any time with thirty days prior notice to the permittee.

This permit is non-transferable.

The above-named restaurant at its above-described address is hereby granted permission to discharge its wastewater into the public sewer that discharges to MSD’s pursuant to the conditions prescribed by this permit, and in accordance with MSD's Schedule of Rates, Rentals, and Charges for Sewer Service.

____________________
John C. Beyke, PE, PLS
Director of Engineering
EFFLUENT LIMITATIONS

During the period of this permit, the permittee is authorized to discharge to MSD's wastewater collection system. The discharge shall not exceed the following effluent limitations.

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Maximum Daily Concentration</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Arsenic</td>
<td>0.57 mg/l</td>
</tr>
<tr>
<td>Total Cadmium</td>
<td>0.43 mg/l</td>
</tr>
<tr>
<td>Total Chromium</td>
<td>5.0  mg/l</td>
</tr>
<tr>
<td>Total Copper</td>
<td>4.2  mg/l</td>
</tr>
<tr>
<td>Total Silver</td>
<td>1.2  mg/l</td>
</tr>
<tr>
<td>Total Zinc</td>
<td>12.7 mg/l</td>
</tr>
<tr>
<td>Total Lead</td>
<td>1.1  mg/l</td>
</tr>
<tr>
<td>Total Mercury</td>
<td>0.0015 mg/l</td>
</tr>
<tr>
<td>Total Nickel</td>
<td>4.1  mg/l</td>
</tr>
<tr>
<td>Cyanide, Amenable</td>
<td>0.50 mg/l</td>
</tr>
<tr>
<td>Oil &amp; Grease (Hydrocarbon)</td>
<td>100.0 mg/l</td>
</tr>
</tbody>
</table>

No person shall discharge into any public sewer wastewater:

Having a temperature higher than 150°F (65.6°C);

Having a pH lower than \( \text{or higher than } \).

No person shall discharge wastes to a public sewer which cause, threaten to cause, or are capable of causing, either alone or by interaction with other substances:

A fire or explosion hazard (e.g., gasoline, kerosene, fuel oil, mineral spirits, benzene naphtha, etc.);

Pollutants which create a fire or explosion hazard in the MSD collection system, including, but not limited to, wastestreams with a closed cup flashpoint of less than 140 degrees Fahrenheit or 60 degrees Centigrade using test methods specified in 40 CFR 261.21.

Any pollutant, including oxygen demanding pollutants [Biochemical Oxygen Demand (BOD), etc.] released in a discharge at a flow rate and/or pollutant concentration which will cause interference with the MSD collection system.

Obstruction to flow in the public sewer or treatment works;
Corrosive structural damage, alkaline encrustations, or other damaging effects to the public sewer or treatment works;

Heat in the amounts that will inhibit biological activity in the receiving MSD treatment plant resulting in interference but in no case in such quantities that the treatment plant influent exceeds 104 °F (40°C) notwithstanding those limits prescribed in Part II.B.;

Danger to life or safety of any person;

A strong offensive odor which prevents the effective maintenance or operation of the treatment works;

Air pollution, toxic or malodorous gases, or malodorous gas producing substances;

Interference with the operation, maintenance or performance of the treatment works;

MSD’s effluent or any other product of the treatment process, residues, sludges or scums, to be unsuitable for or interfere with, reclamation, reuse or disposal;

A detrimental environmental impact, or nuisance in the waters of the Commonwealth or a condition unacceptable to MSD or to any public agency having regulatory jurisdiction over MSD;

Discoloration or any other condition in the quality of effluent from MSD's treatment works such that receiving water quality requirements established by law cannot be met;

Conditions which violate any statute, rule, regulation or ordinance of any public agency or state or Federal regulatory body;

MSD's treatment works to be overloaded or subjected to slug;

Unusual collection or treatment costs to MSD;

The use of a disproportionate share of MSD facilities.

Any trucked or hauled pollutants, except at discharge points designated by the MSD collection system.

No person shall discharge into any public sewer wastewater containing material that would normally be classified as solid waste.

No person shall discharge waste via truck, rail, or dedicated pipeline where such waste constitutes hazardous waste as defined in 40 CFR 261.

No person shall discharge to MSD any non-domestic waste from holding tanks, sludge’s or skimmings from the cleaning or pumping of oil water separators, settling pits, or any pretreatment process either on-site or at any MSD owned collection points. All such discharges are considered Unusual Discharge Requests (UDR) and must be applied for
MONITORING & REPORTING REQUIREMENTS

From the period beginning until the permit expiration, the permittee shall observe wastewater discharge, monitor, and service its grease interceptor on an as-needed basis, but not less than quarterly.

Monitoring Reports

Copies of grease interceptor service receipts shall be submitted on the 15th day of the month following the service period. The first pumping receipt is due by . The pumping receipt shall indicate the condition of the grease interceptor upon pumping. The service receipts shall be directed to the attention of:

Industrial Waste Department
Metropolitan Sewer District
P.O. Box 740011
Louisville, KY 40201

Observation of wastewater quality shall be noted on a log and retained on-site. SEE ATTACHED MSD LOG. The observation point will be marked on the included site map and identified as Outfall #. This represents the final quality of your wastewater after grease separation. SEE ATTACHED SITE MAP.

If the permittee monitors any pollutant more frequently than required by this permit, using test procedures prescribed in 40 CFR Part 136 or amendments thereto, or otherwise approved EPA or as specified in this permit, the results of such monitoring shall be included in any calculations of actual daily maximum or monthly average pollutant discharge and results shall be reported in the monitoring report submitted to MSD. Such increased monitoring frequency shall also be indicated in the monitoring report.

Report of Spill, Upset, Bypass, of Discharge

The following discharges to MSD’s sewer system are prohibited unless specific written authorization (under a UDR permit) is given by MSD; (1) bypasses around a facility’s
pretreatment system, (2) wastewater from spills or upsets in violation of the facility’s permit, spill/slug control plan, or these Regulations, (3) unpermitted bad batches. Compliance with notification provisions of this section shall not preclude enforcement action by MSD to recover costs associated with its response to unusual conditions caused by the user or from assessing penalties related to violations of the discharge requirements. Such notification will not relieve users of liability for any expense, loss or damage to the sewer system, treatment plant or treatment process, or for any fines, civil liabilities or penalties imposed on MSD on account thereof under the Federal Act or State or local law.

Anticipated bypass or discharge in violation of these Regulations: If the user knows in advance of an unavoidable bypass or discharge in violation of these Regulations the user shall submit written notice to MSD at least 10 days prior to such occurrence. The written request should be addressed to MSD’s Enforcement and Inspection Supervisor. If the bypass or discharge in violation of this permit is to occur within 10 days of the permittee's knowledge of the need to bypass or discharge, the user shall immediately notify MSD’s Computer Operation Center at the Morris Forman Wastewater Treatment Plant by telephoning 540-6774 or 540-6710.

Unanticipated spill, upset, bypass or discharge in violation of these Regulations: The user shall immediately notify the Fire Communications Bureau whenever a release of any hazardous material explained in the Hazardous Material Ordinance occurs by telephoning “911”. In all other cases, the user shall immediately notify MSD's computer operation center at the Morris Forman Wastewater Treatment Plant by telephone at 540-6774 or 540-6710 upon the occurrence of an unanticipated accidental discharge or spills in violation of these Regulations, or any slug loads that may enter the public sewer.

Written and telephone notification to MSD shall include company name, caller’s name, telephone number, location of discharge, date and time thereof, type of waste, including concentration and volume, and the measures taken to prevent future occurrences. The user's notification hereunder does not relieve it of other reporting requirements that arise under local, State, or Federal laws. The notification shall include the cause of the unanticipated spill, upset, or bypass, the impact on the user’s compliance status, the duration of non-compliance, including exact dates and times of non-compliance and, if the non-compliance is continuing, the time by which compliance is reasonably expected to occur.

Written notification shall be submitted to MSD within five (5) working days after the discovery of the spill, upset, bypass, or discharge in violation of these Regulations.

The user shall perform sampling during any spill, upset, bypass, or discharge in violation of these regulations as requested by MSD.

Should self-monitoring performed by the user or sampling conducted by MSD indicate a violation, the user shall repeat the sampling for all parameters violated as required by MSD. The user must submit the results of the repeat analysis to MSD within thirty (30) days after becoming aware of the violation.
If the violation continues for a period of more than fourteen (14) days, the user must submit a compliance schedule which addresses the specific limitations violated. The compliance schedule is subject to MSD approval and, pending approval, will be incorporated into the user’s Wastewater Discharge Permit.

Monitoring Facilities

Users may, at MSD’s discretion, be required to install a monitoring facility as stated in the WDRs Section 4.07.

Automatic Resampling

If the results of the permittee's wastewater analysis indicates that a violation of this permit has occurred, the permittee must:

Inform MSD industrial Waste of the violation within 24 hours; and

Repeat the sampling and pollutant analysis and submit in writing, the results of this second analysis within 30 days of the first violation.

ADMINISTRATIVE FINES

Any user who violates conditions set forth in this permit, or who is found to have violated any provision of the WDRs, or orders issued thereunder, may be fined by the Executive Director, or his designee, in an amount not to exceed $25,000 per violation. Each day of non-compliance shall be deemed a separate and distinct violation.

LOUISVILLE AND JEFFERSON COUNTY HAZARDOUS MATERIALS ORDINANCE

The permittee will comply with all requirements of the Louisville and Jefferson County Hazardous Materials Ordinance or article 4.0 of MSD's WDR. As a condition of continued compliance, the permittee shall promptly inform MSD in writing of any changes in the type or quantity of regulated materials stored or used at the facility, or alteration in storage or use of regulated materials. Notification must take place within 60 days of said changes.

SPECIAL PROVISIONS

NOT APPLICABLE

CATEGORICAL STATUS
APPENDIX D
(Oil and Grease Websites)
Oil and Grease Websites

Oregon Association of Clean Water Agencies’ FOG BMP Manual
www.oracwa.org/pages/intro.htm

North Carolina Pollution Prevention site
www.p2pays.org/food/index.htm

Town of Cary, North Carolina
http://townofcary.org/grease/