CONTAINMENT SOLUTIONS

OIL/WATER SEPARATOR
Design/Sizing Questionnaire
Rainwater Runoff

Intended use: Containment Solutions, Inc. Oil/Water Separators are designed to separate free floating oil, grease, and settleable solids from oil/water discharge in a wide variety of applications. The source of the inlet shall be gravity flow. Refer to Containment Solutions if other than gravity flow is required.

Company Name: _____
Address: _____
_____
City: _____
State: _____
Zip: _____
Sales Rep: _____

Telephone No.: _____
Fax No.: _____
Project Name: _____
Project Location: _____
System Requirement: Single Wall ❑
Double Wall (Wet/Dry Monitoring) ❑
Required Oil/Grease Discharge Quality:
_____ (ppm)

Type of Application (check all that apply):

❑ Storm Water ❑ Washdown ❑ Maintenance Facility/Floor Drains
❑ Other/Describe: _____
_____

Flow Conditions

A. Water
Storm Water Runoff Applications Only:
Area to be Drained (Sq. Ft.): _____
Maximum Rate of Rainfall (IN/HR) - see chart: _____
Maximum Flow Rate* (GPM) - use attached worksheet: _____
Water Temperature (°F) - if other than ambient: _____

B. Inlet Oil
Source/Type: _____ Specific Gravity Range: _____ (see attached chart)
Inlet Oil Concentrations (other than spill concentrations) _____ (PPM). Unknown ❑

Storage/Spill

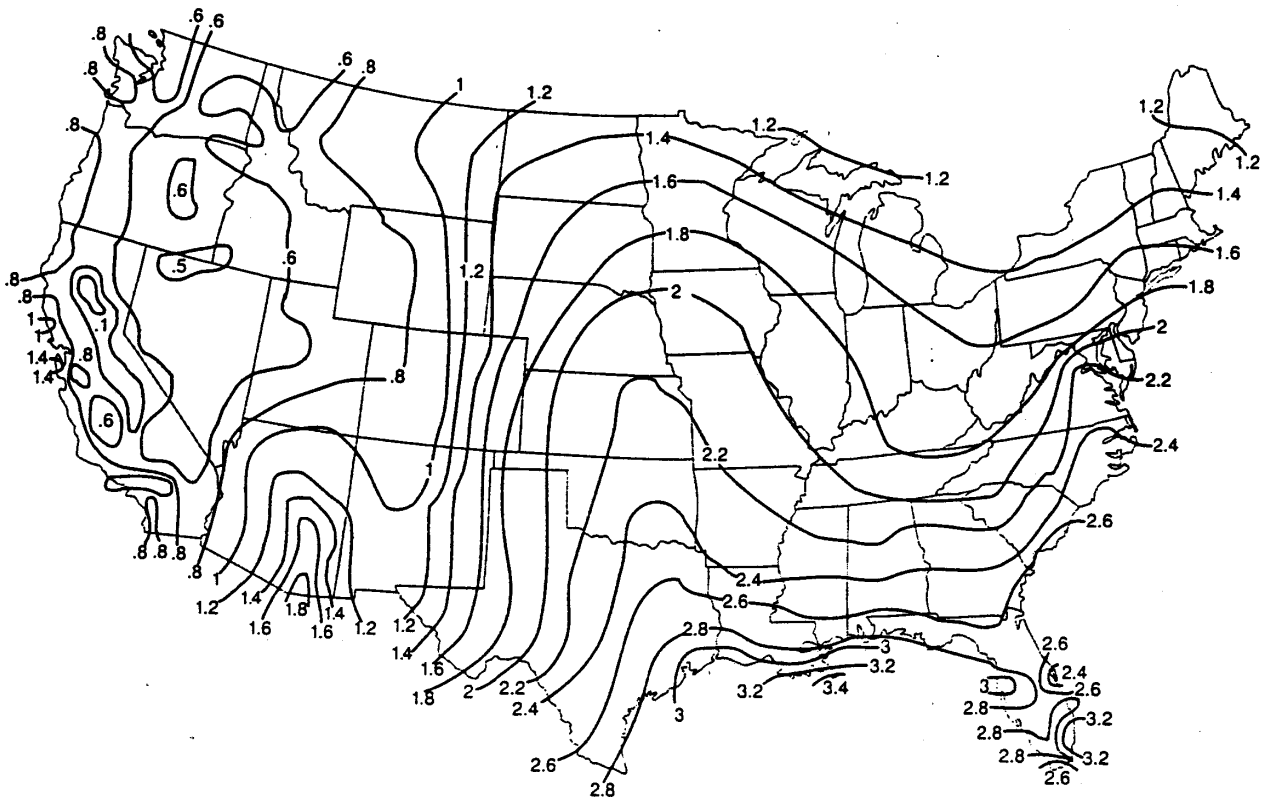
Oil storage capacity requirement for system: _____ gallons. (leave blank if none).
Oil spill capacity requirement for system: _____ gallons. (leave blank if none).

Contaminants

Solids: (Type, Concentration) _____
Is there or will there be a trap, grit chamber or interceptor preceding the Oil/Water Separator?
❑ Yes ❑ No
Detergents: ❑ Yes ❑ No Type: _____

Operating Parameters

Burial Depth: _____ (ft)
Distance Tank Top to Discharge Pipe Elbow: _____ (ft)
Continuous Flow: ❑ Yes ❑ No



This information was provided by the National Weather Service. For detailed information on rainfall in your area, contact your local weather information service.

Storm Water Runoff:

I . Calculate the storm water drainage area that will direct flow through the oil/water separator. It is important to note that diverting drainage away from the oil/water separator that would not have the potential for oil/grease contamination, such as roof drainage, can significantly reduce the flow and thus reduce the required size of the oil/water separator. Check Federal, State and Local requirements.

Length (ft.) _____ x Width (ft.) _____ = _____ Sq. Ft.*

2. Determine from the enclosed U.S.A. Rainfall Intensity Map the rainfall amount for your installation location. The enclosed chart is based on National Weather Service 5 year / I hour duration. State or local regulations vary and may specify alternate guidelines.

_____ in./hr. **

3. Refer to #1 and #2 above and calculate the flow rate as follows:

Sq. ft.* x Rainfall in./hr.** x .0104 = Flow Rate (GPM***).

_____ x _____ x .0104 = _____ (GPM)

4. From the Containment Solutions Oil/Water Separator specification chart, under the “Flow Rate” column, choose the Oil/Water Separator with a flow rate that is equal to or slightly higher than the flow rate calculated in #3 (***).

Model _____

5. Determine if there is a need for emergency spill containment. Check Federal, State and Local requirements. If a hydrocarbon spill potential exists, Oil/Water Separator spill capacity requirements may be determined by:

   A. Multiplying pump flow rate(s) (GPM) times the number of minutes it would take to shut off flow in the event of an equipment failure. Record number of gallons in “A” below.

   B. Determining the largest volume of spill that could result in a product release due to equipment or human failure. Record number of gallons in “B” below.

   A _____ gallons

   B _____ gallons

   Add A and B _____ gallons of spill capacity required.

6. From the Containment Solutions Oil/Water Separator specification chart, under the “Spill Capacity” column, choose the Oil/Water Separator with a spill capacity that is equal to or slightly higher than the spill capacity calculated in #5 above. Model _____ .

7. The Oil/Water Separator to be used is the larger of those determined in #4 and #6.

SPECIFIC GRAVITY OF SELECTED OILS

Fuel Oils	
#1 Fuel Oil	0.79 - 0.85
#2 Fuel Oil	0.81 - 0.92
#3 Fuel Oil	0.82 - 0.95
#4 Fuel Oil	0.88 - 0.97
#5A Fuel Oil (Bunker A)	0.91 - 0.99
#5B Fuel Oil (Bunker B)	0.91 - 0.99
#6 Fuel Oil (Bunker C - Low Sulfur)	0.91 - 1.06
#6 Fuel Oil (Bunker D - High Sulfur)	0.93 - 1.07
#2 Diesel Fuel Oil	0.82 - 0.95
Crank Case Oils	
SAE 10	0.87
SAE 20, 30, 40	0.89
SAE 50	0.90
Machine Tool and Other Industrial Applications	
SAE 75, 80, 90, 140, 250	0.93
Aviation Oils and Fuels	
Jet Fuels	0.74 - 0.85
Reciprocating Engine Fuels	< 0.72
Reciprocating Engine Oils	0.88 - 0.89
Gear and Transmission Oils	
General Purpose	0.88 - 0.92
Marine Propulsion and Stationary Power Turbines	
Light	0.87
Medium	0.87
Heavy	0.89

CONTAINMENT SOLUTIONS

5150 Jefferson Chemical Road
Conroe, Texas 77301-6834
Tel: 936-756-7731
Fax: 936-756-7766
Website: www.containmentsolutions.com