

Appendix L. Unit Process Lists

Table L-1. List of Wastewater Unit Processes

Treatment Stage	Unit Process
Preliminary treatment	Screening
	Flow Equalization
Primary treatment	Flotation
	Primary Clarification or Sedimentation
Secondary treatment	Attached Growth, Aerobic
	Attached Growth, Anaerobic
	Biological Treatment, Other
	Lagoon, Aerobic
	Lagoon, Anaerobic
	Lagoon, Facultative
	Suspended Growth, Aerobic
	Suspended Growth, Anaerobic
	Sludge Blanket, Anaerobic
Nutrient removal and additional treatment	Chemical Addition, Alum
	Chemical Addition, Ferric Chloride
	Chemical Addition, Polymer
	Chemical N Removal
	Chemical P Removal
	Constructed Wetland
	Biological N Removal
	Biological P Removal
	Filtration
Full advanced treatment for potable reuse	Coagulation
	Flocculation
	Media Filtration
	Sedimentation
	Microfiltration (MF)
	Ultrafiltration (UF)
	Reverse Osmosis (RO)
	Electrodialysis (ED)
	Electrodialysis reversal (EDR)
	Nanofiltration (NF)
	Granular activated carbon (GAC)
	Ion exchange
	Biologically Active Filtration (BAF)
	Stabilization, Sodium hydroxide
	Lime stabilization
	Stabilization, Calcium chloride for stabilization
Disinfection	Dechlorination
	Disinfection, Chlorine/chloramine

Treatment Stage	Unit Process
	Disinfection, Thermal
	Disinfection, UV
	Advanced oxidation process
	Disinfection, ozone
	Disinfection, other chemical
Solids handling	Biosolids Aerobic Digestion
	Biosolids Anaerobic Digestion with Energy Recovery
	Biosolids Anaerobic Digestion without Energy Recovery
	Biosolids Chemical Addition
	Biosolids Drying
	Biosolids Incineration
	Biosolids Mechanical Dewatering
	Biosolids Thickening

Table L-2. List of Stormwater Unit Processes

Treatment Stage	Unit Process
Gray infrastructure	Gray stormwater conveyance
	Manufactured devices
	Underground storage
	Real-time controls for CSO management
Green infrastructure	Wet pond
	Dry pond
	Bioretention
	Constructed wetlands
	Permeable pavement
	Green roof
	Cistern
	Infiltration trench
	Rain barrel
	Vegetated swale
	Buffer strip
	Urban riparian restoration

Table L-3. List of Decentralized Unit Processes

Treatment Stage	Unit Process
Decentralized	Aeration
	Evapotranspiration bed
	Filter
	Grinder pump—low-pressure sewer
	Holding tank

Treatment Stage	Unit Process
	Lagoon
	Leach field
	Mound system
	Other non-centralized treatment
	Septic tank
	Trickling filter (unspecified media)
	Wetland