Wastewater Treatment Facility
Anaerobic Digester Technology Comparison
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Parameter	Typical Municipal AD	Newer Municipal AD With Feedstocks	Advanced Wet AD With Mixed Substrates
Process Lab Tests	Basic lab results with conservatively estimated biogas output	Basic lab results with conservatively estimated biogas output	Full lab results with true AD simMlation and derived biogas output
Volatile Solids Removal	40% to 45%	45% to 50%	80% to 90%
Baseline Energy	100%	110%	200%
Parasitic Load (Electrical)	~10%	~10%	~10%
Net Baseline Energy Produced	90%	99%	180%
Mixed Substrate Suitability	Fair	Fair	Excellent
Typical Substrates	Sludge, FOG, DAF, Liquid Food Waste	Sludge, FOG, DAF, Liquid Food Waste	Sludge, FOG, DAF, Liquid Food Waste, Semi-Solid Food Waste. Limited Solid Food Waste & SSO
AD TS Handling	0.75% to 6%	0.75% to 6%	5% to 12%
AD Receiving TS Handling	N/A	2% to 10%	2% to 25%
Typical Input Average TS	3% to 6%	5% to 6%	10% to 15%
Typical Digestate TS	4% to 6%	3% to 5%	5% to 7%
Typical Separated Solids TS	20% to 25%	20% to 25%	30% to 35%
Separated Solids To:	Compost Facility or Incinerator	Compost Facility or Incinerator	Compost Facility or Incinerator
Typical Separated Liquids TS	1% to 3%	1% to 3%	3% to 4%
Separated LiquidsTo:	WWTF Headworks	WWTF Headworks	WWTF Headworks
Substrate Recipe Support	Lab samples with estimated outputs	Lab samples with estimated outputs	AD simMlation for full optimization and likely biogas output
Effective Energy Output With Mixed Substrates	110% to 125%	110% to 125%	150% to 200%
Mixed Substrate Total Net Energy Results (Compared to Baseline)	99% to 112%	109% to 124%	270% to 360%