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1954 - 2024

Orange County
Sanitation District
70th Anniversary

TPAD Digester Facility at Plant No. 2, Project No. P2-128 Update

Presented by:
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Operations Committee
April 3, 2024

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Plant No. 2 Anaerobic Digesters

Raw Sludge

Digesters (98° F)

Class B Biosolids

Digester Gas

15+ Days

After Dewatering

18 Digesters

Project Drivers

- 46-65 years old
- Some are nearing end of useful life
- Seismic deficiencies cannot be cost effectively addressed (2015 Study)
- Liquefaction risks

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Class A vs Class B Biosolids


Class B (OC San’s biosolids)

- Non-food crop direct land application (Arizona)
- Compost processing by vendor to achieve Class A

Class A


- Food crop direct land application (California, Arizona)
- Landscaping amendments



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Biosolids Master Plan (2017)



Technology Evaluation


Base Product

Final Product

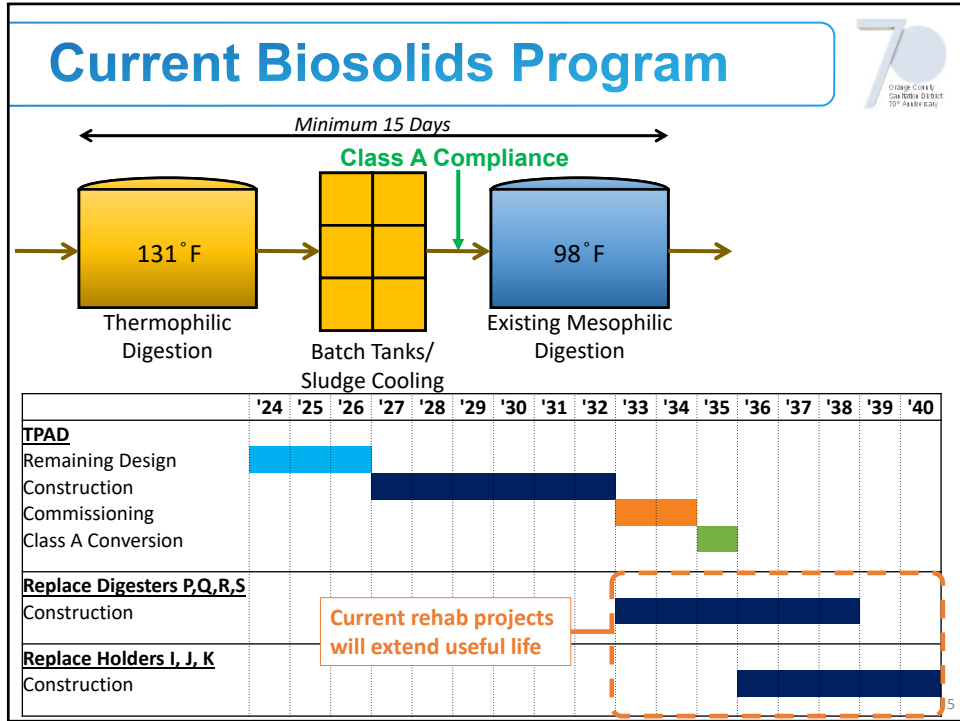
End Use

Little has changed with the Biosolids Market over the last 8 years except potential impact with PFAS and microplastics.

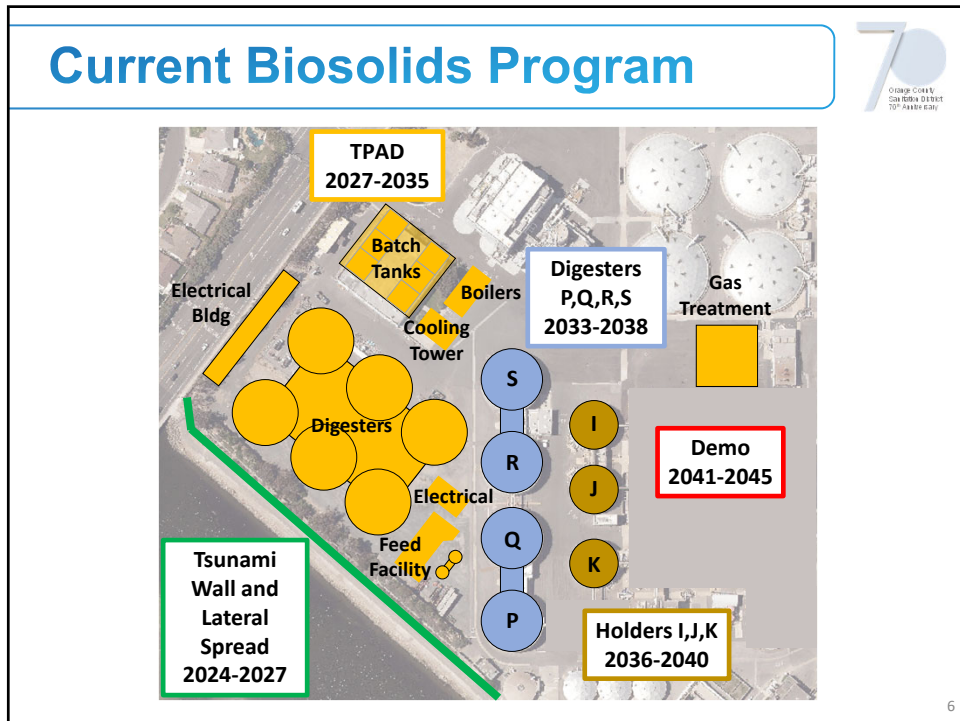
	Class B (Land Application)	Class A (Composting)	Class A (Land Application)
Current	40%	60%	0%
Future (TPAD)	7%	60%	33%



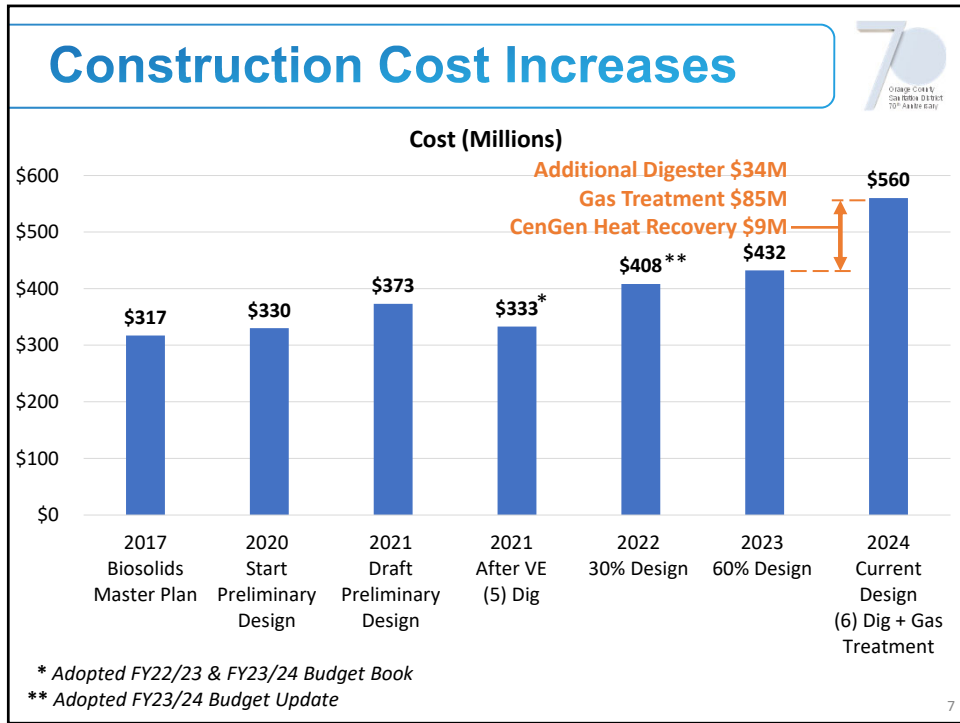
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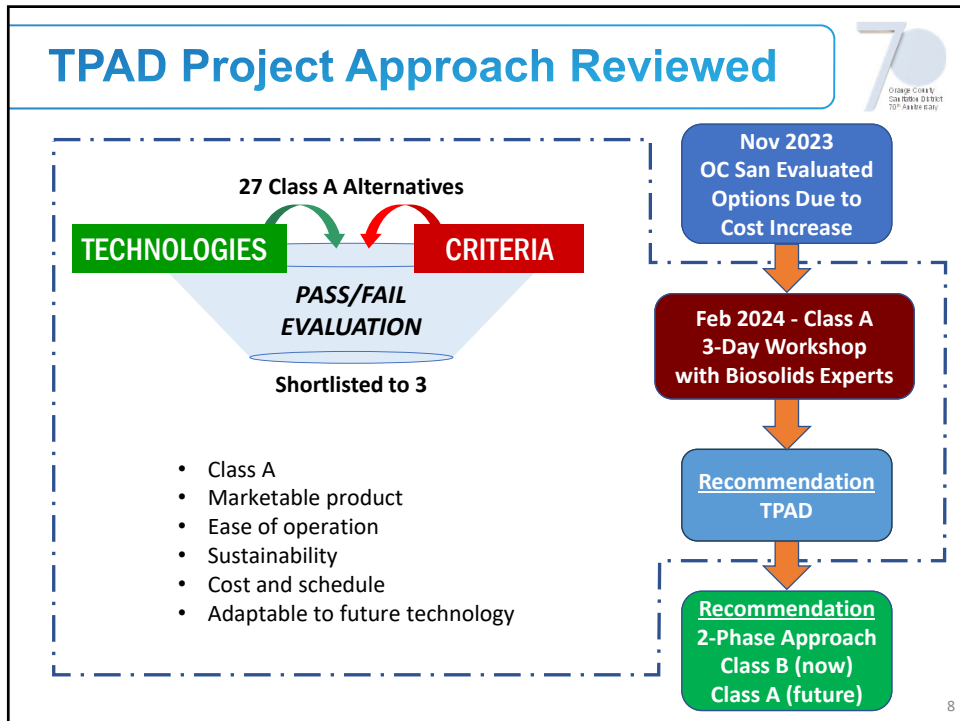
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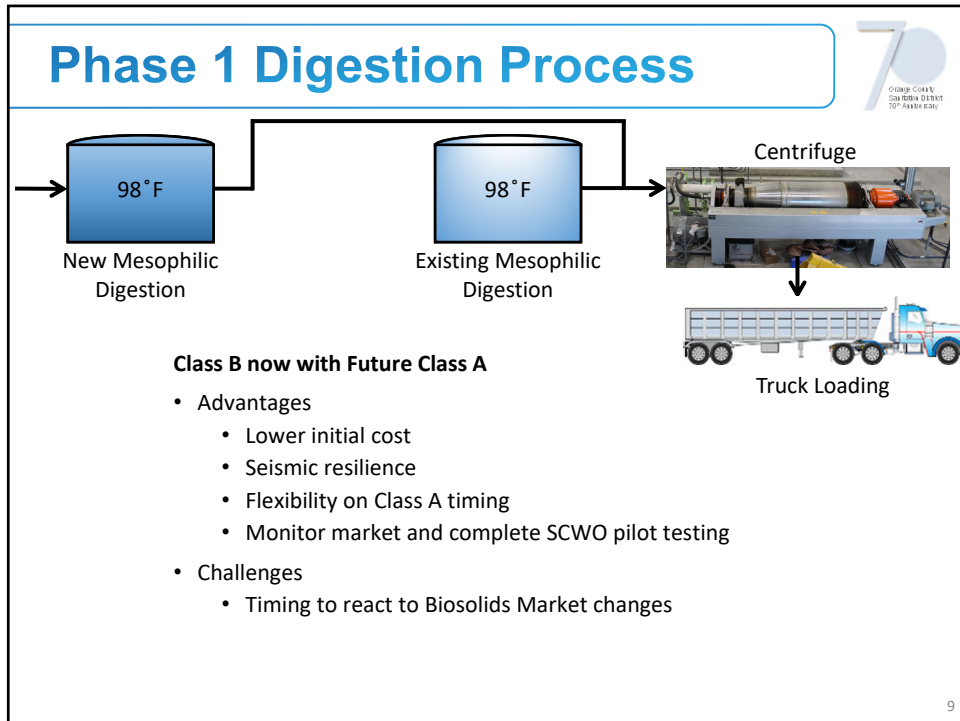
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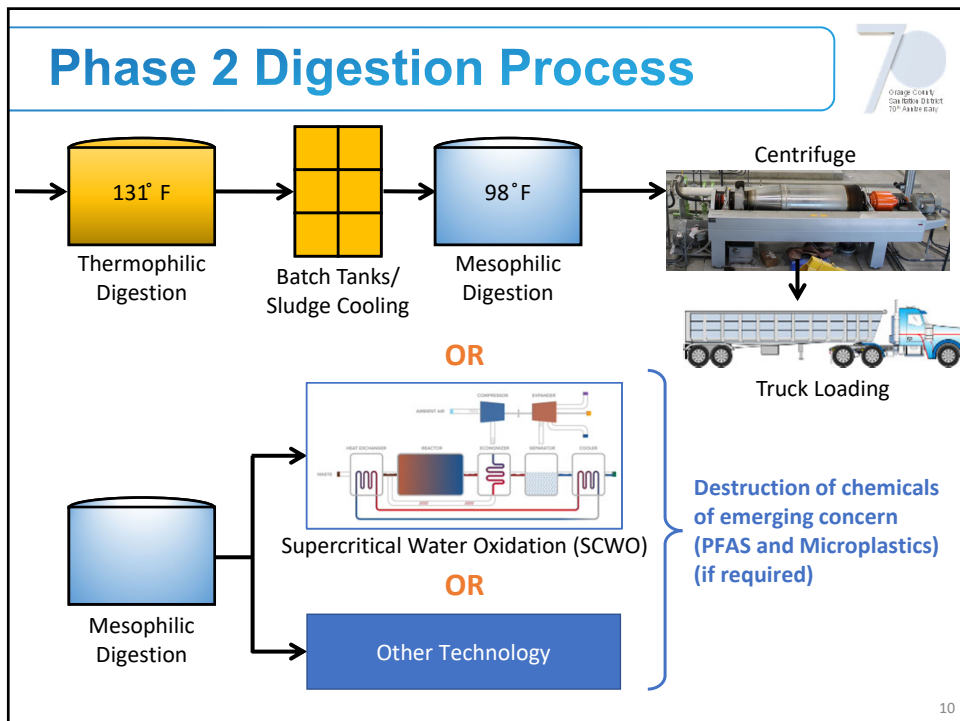
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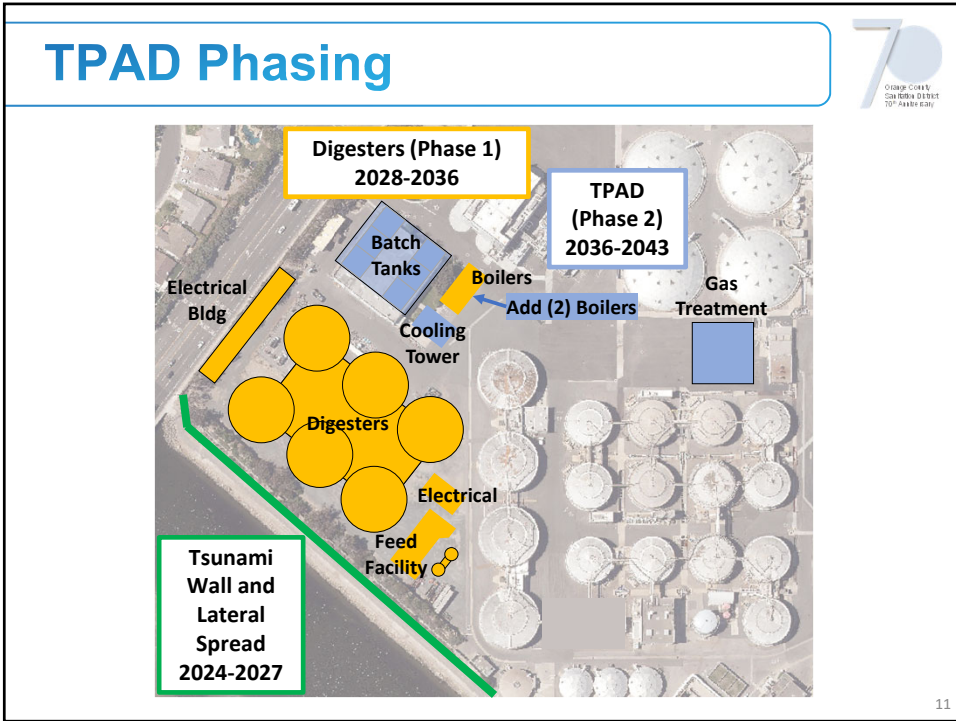
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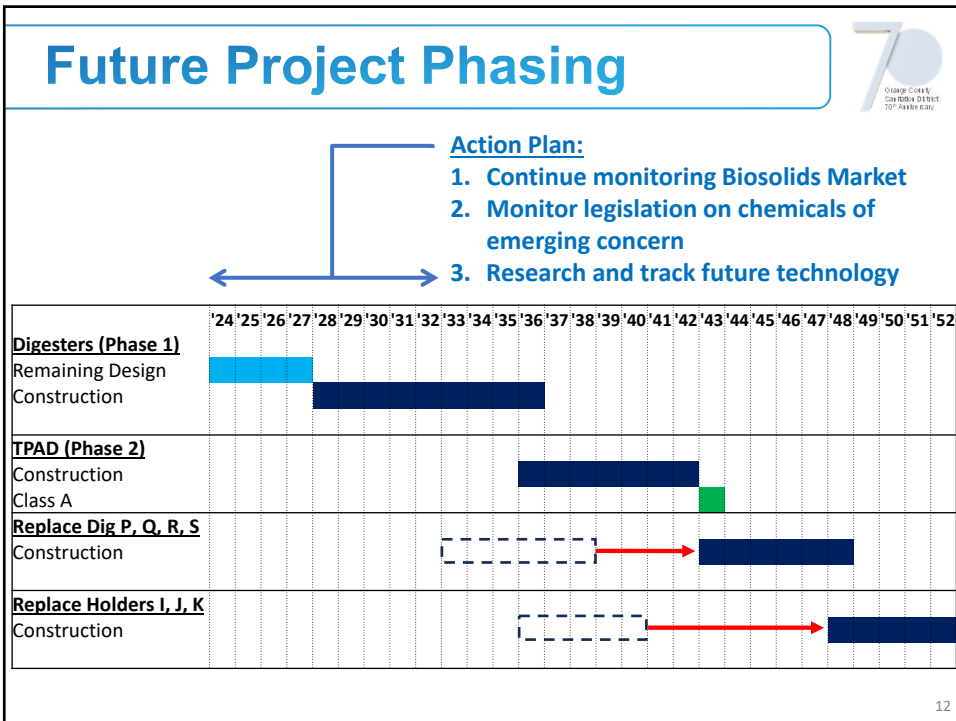
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Budget Overview



	TPAD Cost (\$M)	Meso Cost (\$M)
Design	\$57	\$55
Construction Staff	\$59	\$49
Construction Contractor	\$560	\$408
Contingency Contract	\$56	\$43
Total	\$732	\$555

No Budget Increase

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Questions?

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