Material Subset

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AWM Table:	**Major Culvert**
Attribute:	Material Subset
Purpose:	To identify the specific material used in the construction of culverts, helping assess durability, maintenance needs, structural capacity, and compatibility with surrounding conditions like soil, water flow, and environmental exposure.

Value	Description	Photo Example
Corrugated	A material with a ridged or wavy surface, typically metal or plastic, used to increase strength and flexibility.	
Non-Corrugated	A smooth-walled material, typically used where flow efficiency is prioritised over structural flexibility.	
Cast iron - Cement Lined	Cast iron pipe with a cement layer inside to resist corrosion and improve flow characteristics.	
Steel Reinforced Concrete	Concrete that contains steel bars or mesh to increase its strength and durability.	
Unreinforced Concrete	Plain concrete without any internal steel reinforcement, suitable for lower-stress applications.	
Ductile iron - Cement Lined	A strong iron alloy with added cement lining for corrosion protection and smoother flow.	
Glazed Earthenware	A type of ceramic pipe with a shiny, sealed surface to resist water and chemical damage.	
Vitreous Earthenware	Ceramic pipe that is fired and coated with a glass-like surface to improve durability and impermeability.	
Carbon Reinforced Plastic	Plastic material strengthened with carbon fibres for added strength and chemical resistance.	
Glass Reinforced Plastic	Plastic reinforced with glass fibres, known for being lightweight and corrosion-resistant.	

Value	Description	Photo Example
PE100	High-density polyethylene pipe material rated for high pressure and strength.	
PE80	A slightly lower-grade polyethylene pipe compared to PE100, still suitable for pressure applications.	
Modified PVC (PVC-M)	Polyvinyl chloride that's been modified to enhance toughness and resistance to cracking.	
Oriented PVC (PVC-O)	PVC that has been stretched and aligned during manufacture, making it stronger and more impact-resistant.	
Un-plasticised PVC (PVC-U)	Rigid PVC without added softeners, commonly used in drainage and water systems.	
Stainless Steel (Grade 314)	A type of stainless steel known for moderate corrosion resistance and strength.	
Stainless Steel (Grade 316)	A high-grade stainless steel with excellent corrosion resistance, often used in marine or harsh environments.	
Corrugated Steel	Steel sheet with a rippled profile to add strength and reduce weight.	
Non-Corrugated	Smooth steel pipe or plate without any surface profiling.	
Cement Lined Steel	Steel pipe with a protective internal cement layer to reduce corrosion and improve flow.	
Epoxy Lined Steel	Steel pipe coated internally with epoxy to protect against corrosion and chemical attack.	