

# CARBONBIND® S25E

POLYMER MODIFIED BINDER  
Incorporating Biogenic (plant grown) material  
Sprayed Seal Applications

Puma CARBONBIND® S25E incorporates sustainably grown biogenic (plant derived) material. CARBONBIND® technology allows atmospheric CO<sub>2</sub> captured by plants to be permanently stored in road pavements. This significantly reduces the carbon footprint of the overall binder and sprayed seal solutions that contain it.

S25E is a polymer modified binder (PMB) designed for use in strain alleviating membrane interlayer (SAMI) applications prior to the placement of asphalt.



## Key Benefits

### Performance Benefits

- Purposely designed for use in strain alleviating membrane interlayers (SAMI) to protect asphalt overlays.
- Externally verified to reduce carbon footprint by up to 164 kg/t compared to conventional S25E
- Incorporates ISCC+ certified sustainably grown biogenic bitumen component

### Application Benefits

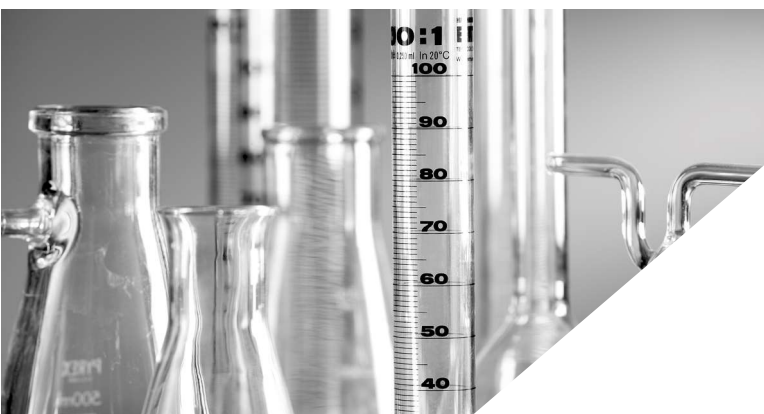
- Same trusted storage and travel stability as Puma OLEXOBIT binders
- Low odour compared to other biogenic binders

## Typical characteristics

Property	Typical Value	Specification Limits	Test Method
Softening Point (°C)	88	82 – 105	AG:PT/T131
Torsional Recovery at 25°C (%)	73	55 – 80	AG:PT/T122
Viscosity at 165°C (Pa.s)	0.8	max. 0.9	AG:PT/T111
Consistency 6% at 60°C (Pa.s)	1200	900	AG:PT/T121
Stiffness at 25°C (kPa)	12	max. 30	AG:PT/T121
Segregation (%)	1.0	max. 8	AG:PT/T108

## Specification

CarbonBind® S25E is manufactured to comply with Austroads ATS-3110 S25E grade.



## Storage & Handling

The storage of bituminous binders for prolonged periods at elevated temperatures should be avoided as quality may be adversely affected. Bituminous binders should be stored at the lowest temperature that enables practical use.

### Temperature Recommendations

Storage for up to 7 days	160 °C – 175 °C
Storage for up to 14 days	145 °C – 155 °C
Minimum pumping temperature	150 °C
Temperature for spraying	180 °C – 190 °C

Refer to AAPA Advisory Note 7 for further information.

## Health & Safety

For a full description of hazards associated with the use of bituminous binders, please refer to the appropriate safety data sheet (SDS) available on the [Puma Bitumen website](#).

## Quality assurance

Puma Bitumen is known in the industry for consistently delivering high quality products. Our products can be relied upon to perform under the most diverse and demanding road conditions in Australia. This is possible thanks to our innovative product technology, comprehensive quality assurance programmes, efficient operations and a sophisticated production process unique to Puma – all supported by our highly skilled and experienced staff.

The Puma Energy Global Bitumen Technology Centre based in Altona, Victoria, is where we conduct industry-leading research and development. It is also from here that we provide technical expertise and support to our customers throughout Australia and across the world. Our team of technical specialists is dedicated to ensuring our products are thoroughly tested at every stage – from the selection of crude oil at the start of the production process, right through to customer supply.

Our product stewardship and rigorous quality management practices reflect our commitment to delivering the highest quality products that perform on the road. Our dedication to quality is recognised by our accreditation to Australian Standard AS/NZS 9001.

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