

## POLYMERS

# SABIC<sup>®</sup> HDPE PIPE P6006RC

## Provisional Data Sheet

### PRODUCT DESCRIPTION

P6006RC is black compound high density polyethylene (class MRS 10 MPa) specially designed for pressure pipe. It offers excellent resistance to slow crack growth propagation in high-pressure pipe applications and can therefore be used with advanced trenchless pipe installation technologies such as re-lining, horizontal directional drilling & pipe bursting.

### TYPICAL APPLICATIONS

P6006RC is specially developed for pressure pipes for portable water, gas, sewage and other liquids.

### TYPICAL DATA

| PROPERTIES                                 | Unit              | Value <sup>(1)</sup> | Test Method |
|--------------------------------------------|-------------------|----------------------|-------------|
| Melt Flow Rate                             |                   |                      |             |
| @ 190°C & 5 kg load                        | g/10 min          | 0.23                 | ISO 1133    |
| @ 190°C & 21.6 kg load                     |                   | 6.4                  |             |
| Carbon Black Content                       | %                 | 2.25                 | ISO 6964    |
| Density @ 23°C                             | Kg/m <sup>3</sup> | 959                  | ISO 1183    |
| <b>MECHANICAL PROPERTIES<sup>(2)</sup></b> |                   |                      |             |
| Tensile Strength @ Yield <sup>(3)</sup>    | MPa               | 23                   | ISO 527-2   |
| Tensile Elongation @ break <sup>(3)</sup>  | %                 | >350                 |             |
| Tensile Modulus <sup>(3)</sup>             | MPa               | 900                  |             |
| Tensile Creep Moduls @ 100h                | MPa               | 360                  |             |
| Charpy Notched Impact Strength @ 23°C      | KJ/m <sup>2</sup> | 26                   | ISO 179     |
| <b>THERMAL PROPERTIES</b>                  |                   |                      |             |
| Oxidation Induction Time (OIT) 210°C       | Min               | 30                   | EN 728      |