

## Technical Data Sheet



### ALTECH PA6 A 2015/710 GF15 IM

|                        |                                                                  |
|------------------------|------------------------------------------------------------------|
| Base Polymer           | Polyamide 6                                                      |
| Filler/Additive System | 15 % glass fibres                                                |
| Colour                 | natural color                                                    |
| Special Features       | high impact modified,heat stabilised,nucleated                   |
| Market Segment         | Automotive,Machinery,building and construction,sport and leisure |
| Application Area       | injection moulded parts                                          |
| Typical Applications   | clothing / fasteners,housings,functional components              |

|                       |                                                                                                                       |
|-----------------------|-----------------------------------------------------------------------------------------------------------------------|
| Pre-Drying Conditions | 80 °C in a dry air (dessiccant) dryer<br>for 2-12 h<br>dependant on moisture content<br>max. moisture content <0,15 % |
|-----------------------|-----------------------------------------------------------------------------------------------------------------------|

|                               |                                                            |
|-------------------------------|------------------------------------------------------------|
| Processing Injection Moulding | melt temperature 270-290 °C<br>mould temperature 80-100 °C |
|-------------------------------|------------------------------------------------------------|

|         |                           |
|---------|---------------------------|
| Storage | dry, protected from light |
|---------|---------------------------|

| Properties                             | dry/cond. | Dimension         | Test Norm   |
|----------------------------------------|-----------|-------------------|-------------|
| <b>Mechanical Properties</b>           |           |                   |             |
| Flexural Modulus                       | 3800 / -  | MPa               | ISO 178     |
| Flexural Strength                      | 135 / -   | MPa               | ISO 178     |
| Tensile Modulus                        | 4800 / -  | MPa               | ISO 527     |
| Tensile Strength at Break              | 90 / -    | MPa               | ISO 527     |
| Tensile Elongation at Break            | 4.2 / -   | %                 | ISO 527     |
| Impact Strength (Charpy, 23°C)         | 70 / -    | kJ/m <sup>2</sup> | ISO 179/1eU |
| Notched Impact Strength (Charpy, 23°C) | 17 / -    | kJ/m <sup>2</sup> | ISO 179/1eA |
| <b>Thermal Properties</b>              |           |                   |             |
| HDT / A (1,8 MPa)                      | 198 / *   | °C                | ISO 75-1/-2 |
| DSC (Melt Point)                       | 220 / *   | °C                | ISO 11357   |
| <b>Rheological Properties</b>          |           |                   |             |
| Shrinkage (lengthwise, 24h)            | 0.3 - 0.5 | %                 | ISO 294-4   |
| Shrinkage (lateral, 24h)               | 0.8 - 1   | %                 | ISO 294-4   |
| <b>Physical Properties</b>             |           |                   |             |
| Density                                | 1180 / -  | kg/m <sup>3</sup> | ISO 1183    |