

**THERMOLAST® K TP6VCN (Series: AD1/CS)**
**KRAIBURG TPE - Thermoplastic Elastomer**
**General Information**
**Product Description**

The AD1/CS series is your material solution for applications with optimized compression set and adhesion to polar thermoplastics such as ABS, PC, PC/ABS, and PBT. The compounds are available in black and natural colors. Natural color variants can be colored in many different ways.

**Typical applications**

- Seals
- Function and design elements
- Cable clips
- Bumpers
- Grommets
- Soft touch surface (thumb wheels, push buttons, switches)

**Material advantages**

- Adhesion to PC, ABS, PC/ABS, ASA, SAN
- Adhesion to PBT
- Optimized compression set
- Optimized mechanical properties

**Regulations / Approvals**

- 49 CFR §571.302 (FMVSS 302)
- VW 50123
- BMW GS 93042
- Mercedes-Benz DBL 5562
- Stellantis B62 0300
- UL 94 HB

**General**

|                           |  |   |                 |
|---------------------------|--|---|-----------------|
| Material Status           | • Commercial: Active                           |   |                 |
| Availability              | • Africa & Middle East<br>• Asia Pacific       | • Europe<br>• Latin America                     | • North America |
| Features                  | • Good Adhesion<br>• Good Colorability         | • Good Compression Set<br>• Resilient           |                 |
| Uses                      | • Automotive Bumper<br>• Buttons<br>• Grommets | • Knobs<br>• Seals<br>• Soft Touch Applications | • Switches      |
| Automotive Specifications | • BMW GS 93042<br>• MERCEDES BENZ DBL 5562     | • STELLANTIS B62 0300<br>• VOLKSWAGEN 50123     |                 |
| Appearance                | • Natural Color                                |   |                 |
| Processing Method         | • Extrusion                                    | • Injection Molding                             |                 |

**Properties <sup>1</sup>**

| Physical                                | Nominal Value | Unit              | Test Method |
|---|---------------|-------------------|-------------|
| Density                                 | 1.10          | g/cm <sup>3</sup> | ISO 1183    |
| Elastomers                              | Nominal Value | Unit              | Test Method |
| Tensile Stress <sup>2</sup> (Break)     | 870           | psi               | ISO 37      |
| Tensile Elongation <sup>2</sup> (Break) | 550           | %                 | ISO 37      |
| Tear Strength <sup>3</sup>              | 85.7          | lbf/in            | ISO 34-1    |
| Compression Set <sup>4</sup>            |               |                   | ISO 815     |
| 73°F, 72 hr                             | 21            | %                 |             |
| 158°F, 24 hr                            | 45            | %                 |             |
| 212°F, 24 hr                            | 67            | %                 |             |



| <b>Hardness</b>                       | <b>Nominal Value</b> | <b>Unit</b> | <b>Test Method</b> |
|---------------------------------------|----------------------|-------------|--------------------|
| Shore Hardness (Shore A)              | 60                   |             | ISO 48-4           |
| <b>Flammability</b>                   | <b>Nominal Value</b> | <b>Unit</b> | <b>Test Method</b> |
| Flame Rating                          | HB                   |             | UL 94              |
| <b>Additional Information</b>         | <b>Nominal Value</b> | <b>Unit</b> | <b>Test Method</b> |
| Adhesion to ABS - (D) <sup>5</sup>    | 34                   | lbf/in      | VDI 2019           |
| Adhesion to PC - (D) <sup>5</sup>     | 31                   | lbf/in      | VDI 2019           |
| Adhesion to PC/ABS - (D) <sup>5</sup> | 34                   | lbf/in      | VDI 2019           |

#### Notes

<sup>1</sup> Typical properties: these are not to be construed as specifications.

<sup>2</sup> Type S2, 7.9 in/min

<sup>3</sup> Method Bb, Angle (Nicked)

<sup>4</sup> Method A

<sup>5</sup> Two-component injection molding

