Task:

Application field: Chemistry / Plastics

Material:

<table>
<thead>
<tr>
<th>Polymers:</th>
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<tbody>
<tr>
<td>1) LDPE (Low Density Polyethylene),</td>
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<tr>
<td>2) ABS (Acrylnitributadienstyrol Copolymer),</td>
</tr>
<tr>
<td>3) PC (Polycarbonate),</td>
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<tr>
<td>4) PBT-GF30 (Polybutylenterephthalate with 30 % glass fiber)</td>
</tr>
</tbody>
</table>

Feed size: 0-70 mm

Feed quantity: 60 g (per sample)

Material specification(s): elastic, electrostatical

Customer requirement(s): < 1.5 mm

Subsequent analysis: not defined

Solution:

Selected instrument(s): Cutting Mill SM 100

Configuration(s):

| Standard hopper SM; |
| Ring-type filter with trapezoid hole body SR/SK/SM f or collecting receptacle 5 litres; |
| Bottom sieve SM square holes 2 mm, stainless steel |

Parameter(s): Revolution speed approx. 1500 rpm

Time: 3 min. (approx. per each test)

Achieved result(s): predominantly 1 - 1.5 mm

Remark(s): For the grinding of elastic polymer samples the Cutting Mill SM 100 is suitable under the above mentioned conditions.
Pictures of the sample

**Fig. 1.1:** LDPE original parts

**Fig. 1.2:** LDPE parts after grinding in SM 100 with bottom sieve 2 mm

**Fig. 2.1:** ABS original parts

**Fig. 2.2:** ABS parts after grinding in SM 100 with bottom sieve 2 mm
The application report is based solely on the processing of the available sample material in the indicated amount. No legal claims shall be derived from this test report. Subject to technical modification and errors.

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