



Centre for Analysis and Testing of Plastics (KAP)





The "KAP"

KAP – the Centre for Analysis and Testing of Plastics – is a unit within the Institute of Plastics Processing. We look at specific problems in business and science and seek optimal solutions. For this purpose, we can fall back on extensive, state-of-the-art analysis and testing capabilities.

Using faults to advantage

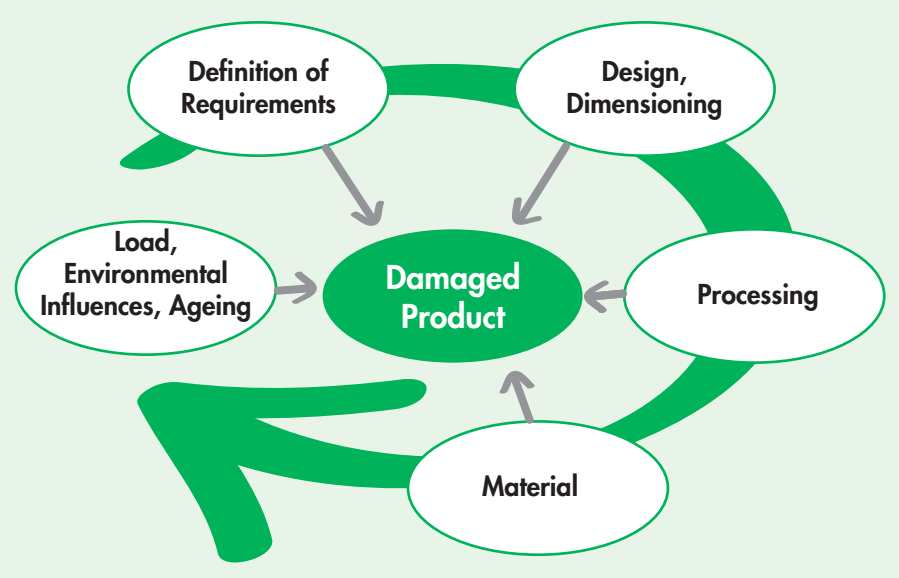
Defects, faults and damage actually provide a useful opportunity to make key improvements to a product. A damage analysis gets straight to the heart of the matter. It reveals the general state of a product and its quality. This helps to obtain valuable findings for ongoing production and for future developments – and thereby minimises risks. The Centre for Analysis and Testing of Plastics offers a wide-ranging support in this.

Solutions from a single source

The aim of damage analysis is to establish the causes of faults or damage and, by identifying specific characteristics of a defective product, to draw conclusions on the causes of the fault. These causes may be rooted in any of the lifecycle phases of the part. A fault analysis looks at the following parameters:

- incomplete or wrong definition of requirements
- faulty design
- unsuitable choice of material and inhomogeneities in the material
- inappropriate processing conditions
- overstressing of the material

To draw up a successful and systematic solution strategy, we get together with you to isolate potential negative influences and identify the likely reasons for the damage, which can then be specifically targeted. This makes damage analysis efficient and profitable.



Using analytical procedures to your advantage

Only when the damage history has been tracked and the cause of the damage clarified is it worth moving on to instruments for analytical testing. The testing and analysis equipment available in the KAP offers a solid basis for answering all questions that may arise concerning the process, the material or the stresses to which plastics are subjected in practical application.

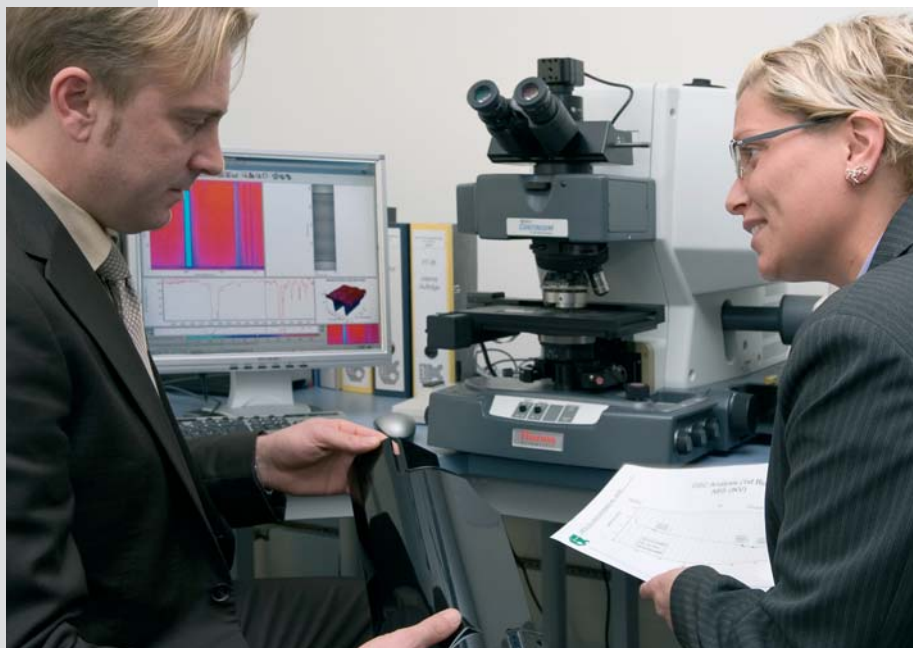
The advantages are obvious. In addition to its wide range of machines and equipment, the KAP also offers sound expert know-how, scientific methods, many years of experience in analysis and testing, and a wealth of technical knowledge relating to the plastics industry. This enables us to find suitable solutions to your problems.

Cooperation with customers

After making initial contact with one of our staff by phone or e-mail, we study your problem and examine possible solutions. We can usually tell you straight away how to solve the matter quickly, uncomplicatedly and successfully.

Analysis and testing facilities in the KAP

- Microscopy
- Spectroscopy
- Thermal analysis
- Rheometry
- Mechanical testing
- Other chemical/physical methods



Certified according to ISO 9001:2008
Certificate Registration-No. 316496 QM08

Institut für Kunststoffverarbeitung

in Industry and the Skilled Crafts at RWTH Aachen University
Pontstraße 49 · 52062 Aachen · Germany
Prof. Dr.-Ing. Dr.-Ing. E.h. Walter Michaeli
www.ikv-aachen.de

Centre for Analysis and Testing of Plastics (KAP)

Dr. rer. nat. Rainer Dahlmann

Phone: +49 (0) 241 80-25928, Fax: +49 (0) 241 80-22316, E-Mail: dahlmann@ikv.rwth-aachen.de

CONTACTS:

Chief Engineer	+49 (0) 241 80-93823	oberingenieur@ikv.rwth-aachen.de
Injection Moulding / PU Technology	+49 (0) 241 80-93827	sg-pur@ikv.rwth-aachen.de
Part Design / Materials Technology	+49 (0) 241 80-28359	fawt@ikv.rwth-aachen.de
Rubber Technology	+49 (0) 241 80-28359	kautschuk@ikv.rwth-aachen.de
Composites	+49 (0) 241 80-23884	fvk@ikv.rwth-aachen.de
Extrusion and Further Processing	+49 (0) 241 80-28372	ext@ikv.rwth-aachen.de
Training / Skilled Crafts	+49 (0) 241 80-93812	handwerk@ikv.rwth-aachen.de

