

# Determination of Thermal Resistance R and Heat Transmission Coefficient U

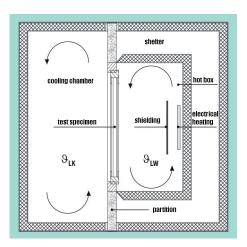
of windows, doors, shutter boxes, roof windows and the like

# Test facility

The test facility allows the measurement of the heat transmission coefficient of complete windows (frame and glazing), skylights, doors, roller shutter casings and the like.

Besides standard measurements our test facility also allows special measurements for product developments and specific applications. It is unnecessary to mention that we apply state-of-theart measuring and control technology.

The respective test specimen is installed between two rooms with different air temperatures. The heat flow characteristic of the heat transmission coefficient flows through the test specimen in the steady state.



### **Testing**

Measurements can be conducted according to the following standards:

Standard testing of windows and doors according to DIN EN ISO 12567-1, of skylights according to DIN EN ISO 12567-2, of profiles according to DIN EN 12412-2, of roller shutter casings according to DIN EN 12412-4, of roof elements, façade elements and walls according to DIN EN ISO 8990.

The test openings described in the following are available for standard and specific measurements:

#### Fraunhofer-Institute for Buidling Physics

Nobelstraße 12 70569 Stuttgart Germany

Department Hygrothermics Test laboratory of thermal parameters www.ibp.fraunhofer.de/pruefstellen

Dipl.-Ing. (FH) Andreas Zegowitz Phone +49 711 970-3333 Fax +49 711 970-3340 andreas.zegowitz@ibp.fraunhofer.de Determination of Thermal Resistance R and Heat Transmission Coefficient U

## Dimensions

The following test openings are available for standard and specific measurements:

Test opening I: (standard)	width x height	1230 mm x 1480 mm
Test opening II:	width x height	1400 mm x 1600 mm
Test opening III:	width x height	1100 mm x 1600 mm
Test opening IV:	width x height	1600 mm x 2000 mm

Investigations of smaller windows (from approx. 1.5 m²) can be conducted by means of masks made of insulating material. Further universal test facilities of larger dimensions are available for investigations of larger windows and façade elements.

## Competences

The test laboratory is accredited by the Deutsches Institut für Bautechnik, DIBt (German Institute for Building Technology) according to LBO/BRL (BWU 010) and according to BauPG as Notified Body No. 1004 for products according to EN 14351-1 and granted flexible accreditation by the Deutsches Akkreditierungssystem Prüfwesen, DAP (German Accreditation System of Testing) under No. DAP-PL-3743.27.