



**Kit DSC 2016 PTP  
Composite**

## Technical Definition

Differential Scanning Calorimetry - DSC

### ***Instructions to participant laboratories***

Please read carefully these instructions **BEFORE** starting the tests.

1. One specimen (30 x 10 x 2 mm) is supplied to each participant – 5 results must be provided.
2. All tests are to be performed in accordance with the requirements of EN ISO 11357 (2013) or AITM 3-0008 issue 1. Tests shall be performed by the same operator on the same test machine.

Additional information:

- Heating temperature: 10°C/min, from ambient temperature to 310°C.
  - Perform sampling on the side opposite to the identification mark.
  - For  $\Delta H_{100}$  calculation :
    - i. Average Fibre volume content of the sample is 65%,
    - ii. Resin content is 35  $\pm$ 2 % by weight.
3. Each participant is required to determine the following parameters:
    - Reaction enthalpy : Enthalpy value  $\Delta H$
    - Reaction enthalpy corrected to 100% resin content :  $\Delta H_{100}$
    - Temperature Onset of the reaction
    - Temperature Peak on the cured specimens as defined in the EN ISO 11357 or AITM 3-0008.
  4. The following information need to be reported:
    - Specimens mass.
    - Equipment and test parameters used. (Heating; temperature range...)
  5. Results are to be reported as follows:
    - Reaction enthalpy (XX,X J/g)
    - Temperature Onset (XXX °C)
    - Temperature Peak (XXX °C)

A standard complete test report shall be stored by the participant, in case of suspicious results it will be asked for investigation by the sponsors
  6. Testing shall start as soon as test specimens are received. All participant laboratories must supply results by September 2<sup>nd</sup>, 2016.
  7. Instructions for submission of results are detailed on the website:  
<https://ptpscheme.com>
  8. To ensure confidential treatment of results in the final report, each participant lab will be provided with a unique identity number at the moment of his registration to the program.
  9. The sponsors could ask you proofs of your records and analyses, so be sure to conserve data, curves and specimens.