

## 1. DIFFRACTOMETERS

The **4-circle single-crystal Nonius Kappa-CCD X-ray** diffractometer is dedicated to the structural studies of organic, organometallic and inorganic compounds, and minerals. This instrument is equipped with a **Kappa goniometer**, a traditional source of X-rays (Mo anode) and a **two-dimensional CCD detector**.

The diffractometer is also equipped by a low temperature system : a **Cryostream Cooler Oxford 600** (100K with 373K) and a high temperature system : a **Gas Blower GSB 1300** allowing to work until 1200K.



**Powder X-ray diffractometer Bruker D8 Advance:** XRD setting for structure analysis of polycrystalline and amorphous materials. Copper target X-ray tube used with curved-graphite monochromator. It is equipped with Ground Incidence Diffraction (GID) attachment.

**Software:** DIFFRACplus EVA – software package for quick qualitative and semi-quantitative phase analyses, lattice parameter and mean crystallite size determinations, coupled with ICDD-PDF2 data-base. TOPAS for Rietveld refinement.

