GIWAXS experiments were carried out at NCD-SWEET beamline at ALBA Synchrotron (Barcelona). The samples were measured in a grazing-incidence geometry, placing the beam at an incident angle of 0.12º to probe the total volume of the film. The energy of the beam was 12.4 keV (𝜆=0.1 nm). Exposure times of 1 second were applied. The patterns were taken with the WAXS LX255-HS detector (Rayonix), placed at 20 centimetres from the sample position, using pixels of 88.5 x 88.5 µm2. The 2D pixel maps were transformed into q-space and integrated using a self-made MATLAB script and pyFAI package of Python.

More info: <https://www.cells.es/en/beamlines/bl11-ncd>

GISAXS measurements were performed at SAXS beamline, at Elettra Sincrotrone (Trieste, Italy). Thin film samples were measured using an incoming X-ray beam at an incident angle between 0.12 and 0.15º and exposition times of 10 seconds. The wavelength of the X-ray beam was 𝜆=0.154 nm (E=8 keV). The patterns were taken using a Pilatus 1M detectors (Dectris), whose pixel size is 172 x 172 µm2, placed at 1200 millimeters from the sample position. 2D pixel maps were transformed into q-space and integrated using a self-made MATLAB script.