Characterize form parameters with a large field of view

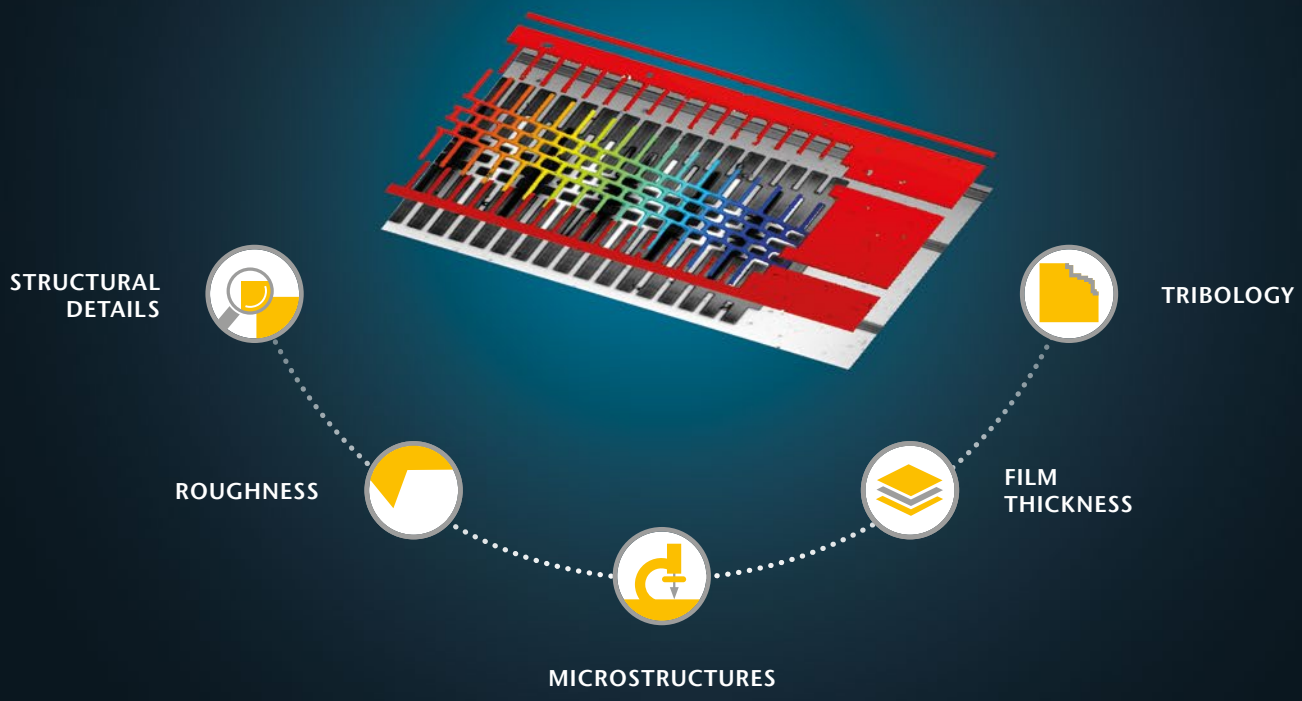
Measure flatness, waviness and more

Regarding functional surfaces, flatness is often decisively important. Examples are parts with sealing surfaces for pressure and vacuum technology, and also transparent foils for displays, semiconductor components, metal and ceramics surfaces. TopMap systems allow an areal measurement of large surfaces up to a volume of 230 x 220 x 70 mm^3 and therefor provide a fast, reliable and complete characterization of your workpiece.

Analyze multiple surfaces

Determining parallelism, height differences or angles between several surfaces often require a large vertical measurement range. TopMap large FoV systems offer vertical range up to 70 mm which allows you to measure surfaces separated by high steps or located at the base of drilled holes. The telecentric optical design avoids shadowing effects.

Characterize structures with high resolution



Characterize microstructures

Functional surfaces often require certain structures. For example, it can be important to characterize the type and distribution of pores used to hold lubricant between frictional surfaces in tribology. Besides, microstructres show a key role for improving the adhesion of coatings in the steel industry. Unwanted structures may increase frictional forces or cause disturbing vibrations.

Evaluate roughness

Characterization of roughness is a must-do, particularly when wear properties, lubrication or the bearing load of product surfaces need to be subsequently optimized. Information with micrometer and nanometer resolution is crucial for characterizing texture and for improving evaluation methods.