

SE-RAY-RCS

Scattering

RADAR

Reflection

Diffraction



DETECTION

Compute reliable RCS of complex targets

Advanced RCS computation tool

SE-RAY-RCS main features:

RF models validated by ONERA, FOI and FGAN in Germany

Very efficient computation kernel, even for very complex objects described by a several millions polygons CAD model

Can compute dielectric objects and diffraction by edges

Can deal with almost all popular CAD formats thanks to its associated 3DS max plug-in

Easy-to-use product thanks to its dedicated GUI

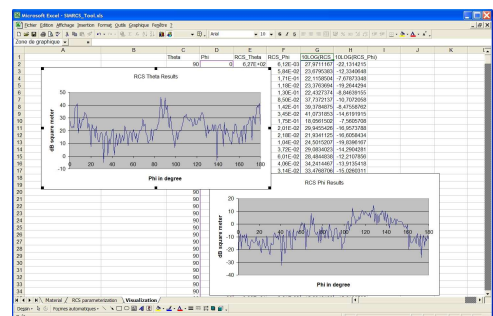
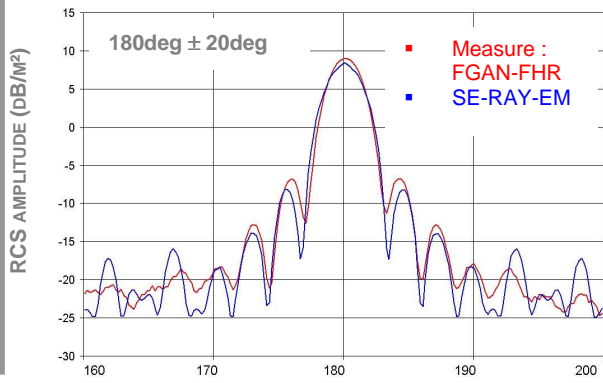
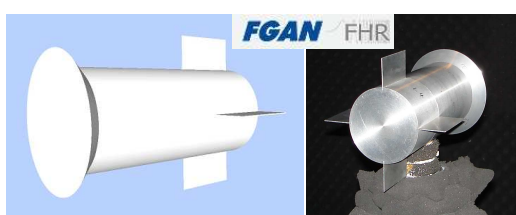
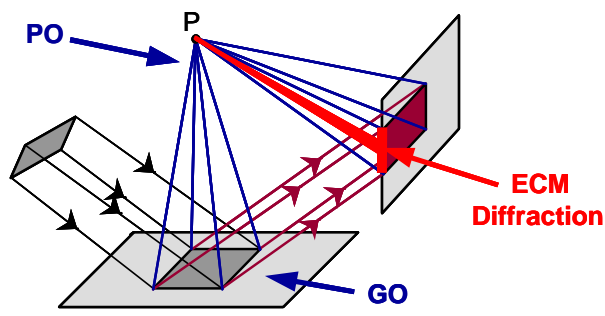
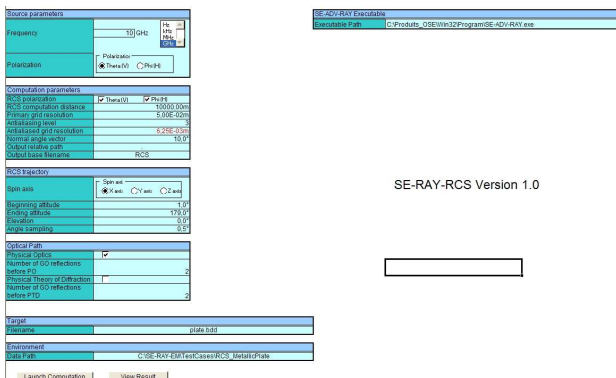
SE-RAY-RCS takes advantage of the recent improvements in the field of 3D graphics to compute very efficiently the RCS of a target which 3D mock-up is made of up to several millions polygons.

Key advantages

- Complex 3D targets management
- Robust electromagnetic models
- Precise computation of the complex reflection coefficient on a surface including multilayer materials and the divergence factor
- High performance even for a very complex target
- Dedicated user friendly GUI
- Services associated to the product (hotline, maintenance, training)

Physical model features

- Association of shooting and bouncing ray technique (ray tracing) & electromagnetic asymptotic formulations
- Scattering computation using Physical Optics
- Multiple reflections computation using Geometrical Optics
- Edge diffraction computation using the Equivalent Current Method of Michaeli extended to targets covered by dielectric materials
- Geometrical divergence in GO reflection computation
- Reflection and scattering on multilayer dielectric materials



Benefits:
 RF formulations validated by ONERA
 Adopted by FOI in Sweden and by FGAN in Germany
System requirements :
 Windows™ 2000, XP