

Advanced Solutions in Surface Engineering Technology ASSET™

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Presentation

Abstract: ASSET™ combines chemistry and formulation expertise at Triton Systems with the Atmospheric Pressure Plasma Liquid Deposition (APPLD™) process developed by Dow Corning. This unique approach for surface modification and functional coatings enables new products and applications for a host of end uses.

The patented APPLD™ technology allows users to engineer the surface of virtually any substrate, rigid or flexible, smooth or textured, finished or unfinished (for example electronics, various hardware, optical components, devices, films, textiles, fibers) by applying thin (typically 10-250 nanometer) coatings of various materials that bond strongly to the underlying substrate. Coatings have a wide range of characteristics, such as waterproofing, oil proofing, low-friction slickness, adhesion promotion, antireflective, dielectric or antimicrobial properties. The energy-efficient APPLD™ process operates at near room temperature and pressure, uses no water, solvents or surfactants and has negligible waste disposal or recycling needs. It offers broad design flexibility and functionality. Examples that show the advantages of this technology will be shared in this presentation.