

## Over the Horizon Radar Systems



### Project Summary

- Over-The-Horizon Radar (OTHR) is a radar system that makes use of the atmospheric reflection and refraction phenomena to extend its range of detection beyond line of sight.
- The presence of very strong clutter brings great difficulties to processing of weak target echo signals. Effective clutter suppression methods with minimum target signal distortion are being considered.
- New time-frequency analysis methods of signal's Doppler signature are being developed which reveal detailed information of targets' movement pattern.