E. Michelle Neely

Advisor: Shan de Silva

•B.S. – Geology, Space & Planetary Science minor, Portland State University, 2014

•Graduate GIS Certificate, expected June 2016

Research and Other Interests:

Planetary geomorphology, arid landscape evolution (aeolian, cryotic), igneous weathering and transport, igneous petrology, remote sensing, GIS, geovisualization, science education and public outreach

Masters Thesis:

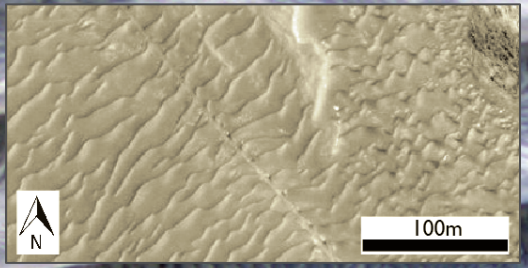
Gravel-mantled aeolian bedforms in the Argentine Puna: spatial pattern analysis, and their implications as analogs for Transverse Aeolian Ridges (TARs) on Mars

Research Objectives:

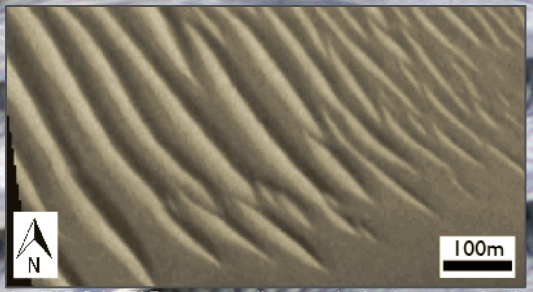
1) Understand the relationship between Puna bedform patterns and local winds
2) Understand the relationship between Puna bedforms and underlying bedrock topography
3) Compare Puna bedform fields to analogous Martian TAR fields

Recent Publications / Presentations:

Neely, E.M., Spagnuolo, M.G., de Silva, S.L., Bridges, N.T., Zimbelman, J.R., 2014, Methodology of wind tunnel experiments applied to gravel megaripple formation on Earth and Mars, Poster presented at the 45th Annual Lunar and Planetary Conference, Abs. #2767.



Puna bedform field. Note the pattern change near bedrock topography in the upper right (Image credit: CNES).



Martian TAR field, TARs are not adjacent to bedrock topography (Image credit: NASA/JPL/MSSS).