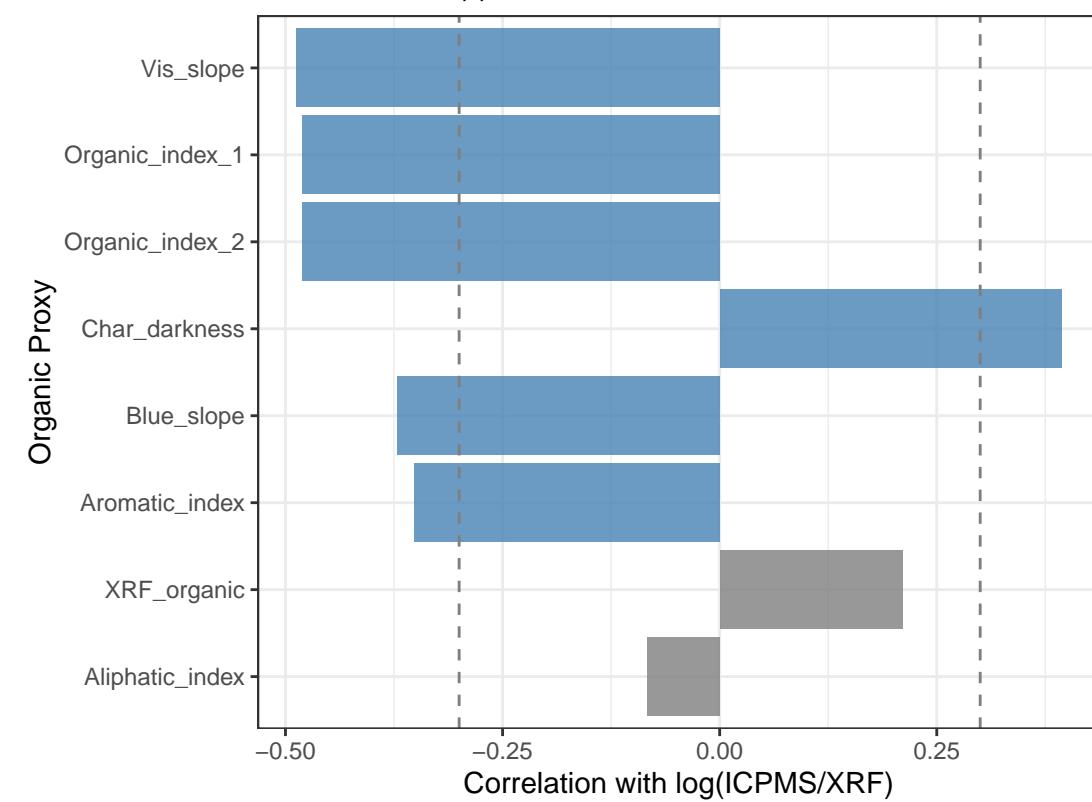


Improved Spectral Organic Proxies from ASD

Peak-based indices outperform simple albedo for organic detection

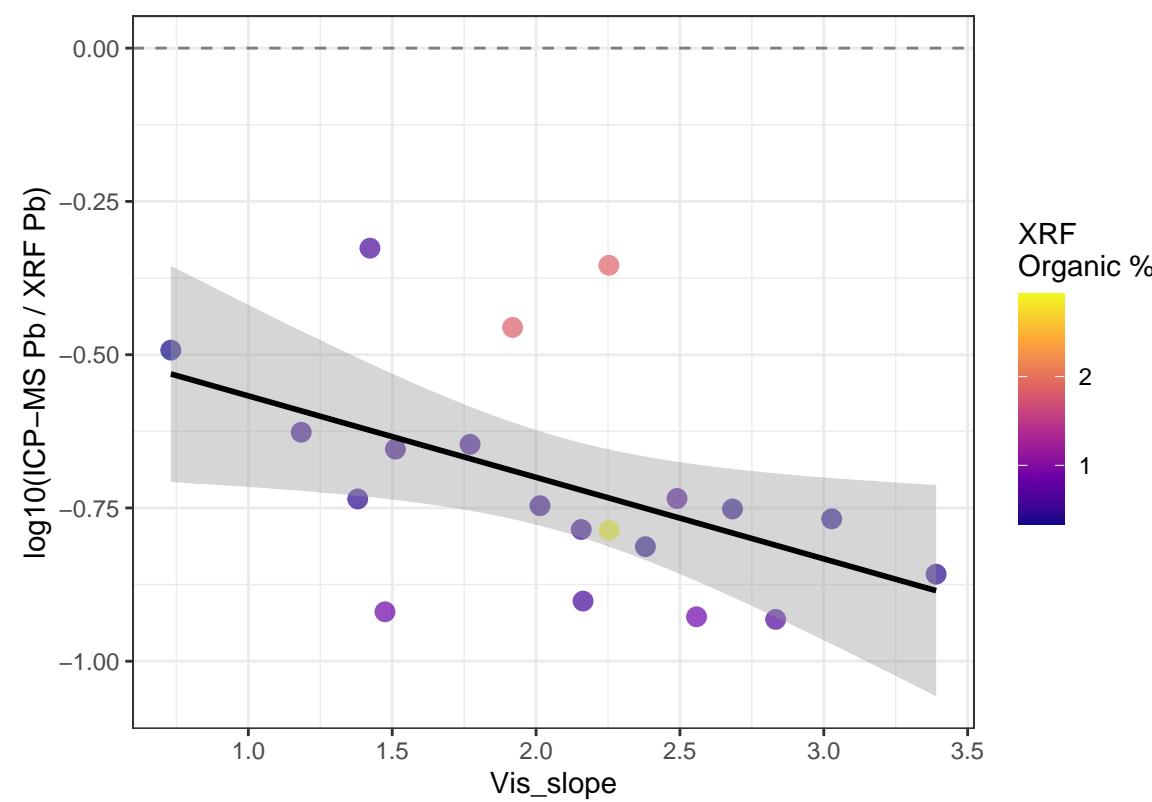
A) Spectral Organic Proxies vs Pb XRF-ICPMS Offset

Dashed lines = $|r| = 0.3$ threshold



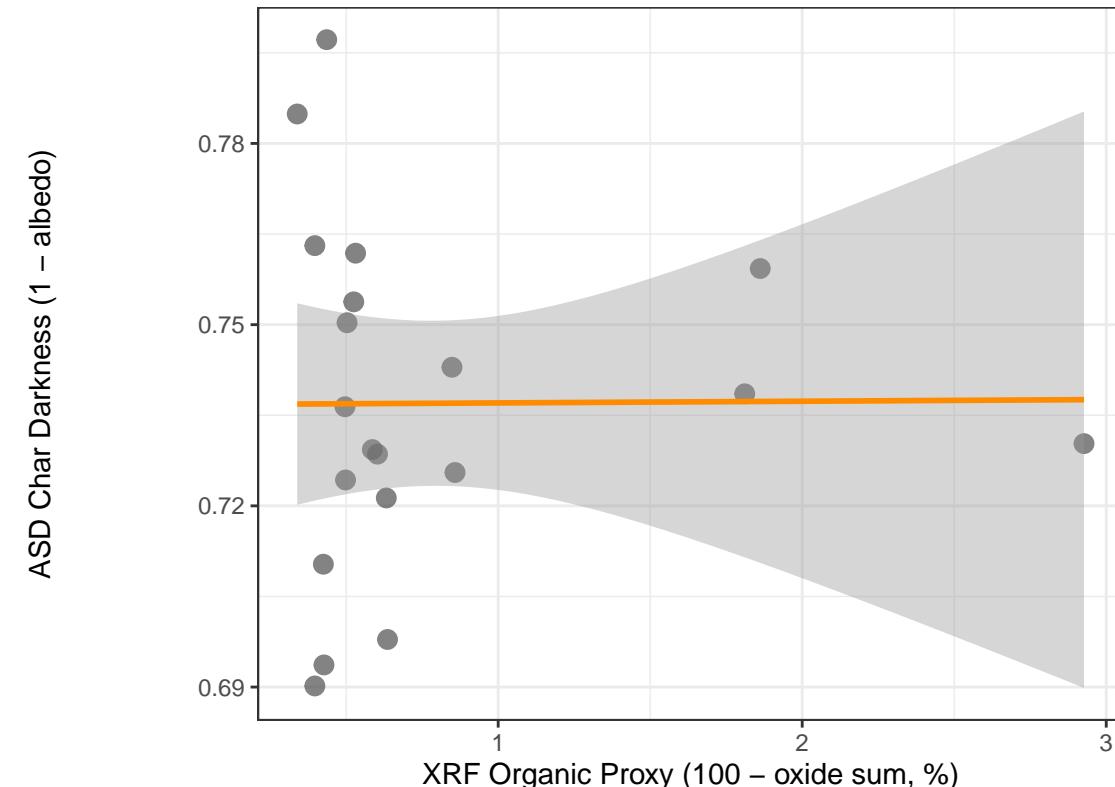
B) Vis_slope vs Pb Offset

$r = -0.488$



C) Spectral Char Darkness vs XRF Organic Proxy

$r = 0.006$



D) Distribution of Visible Slope (Char Indicator)

Higher values = more char-like spectral signature

