



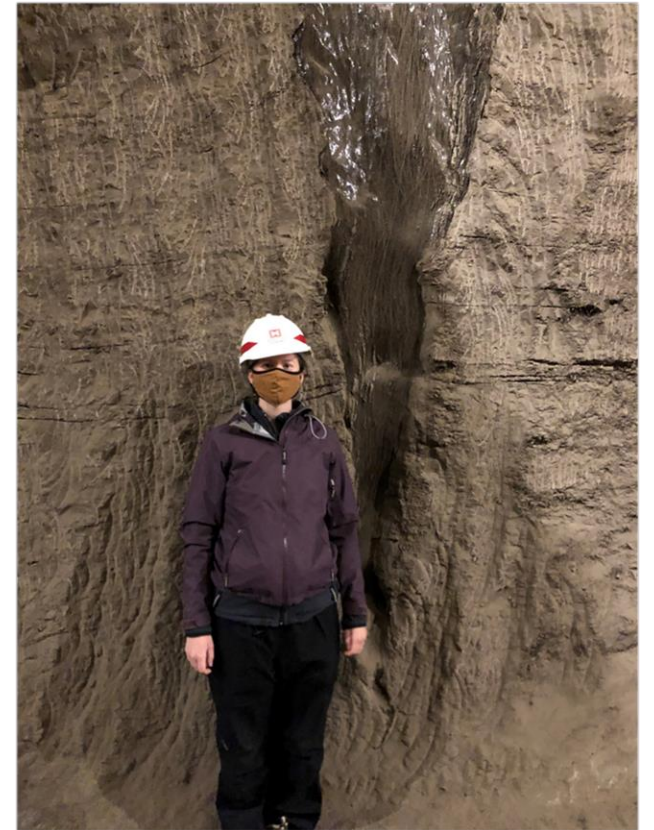
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FAIRBANKS, ALASKA



# Quantifying micro-topographic impacts in ice wedge systems: a preliminary assessment

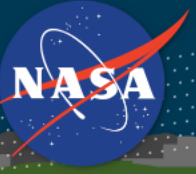
Melissa Ward Jones,

Benjamin Jones, Skip Walker, Mikhail Kanevskiy, Yuri Shur, Jana Peirce, Simon Zwieback, Amy Breen, Emily Youcha, Go Iwahana and Charles Miller

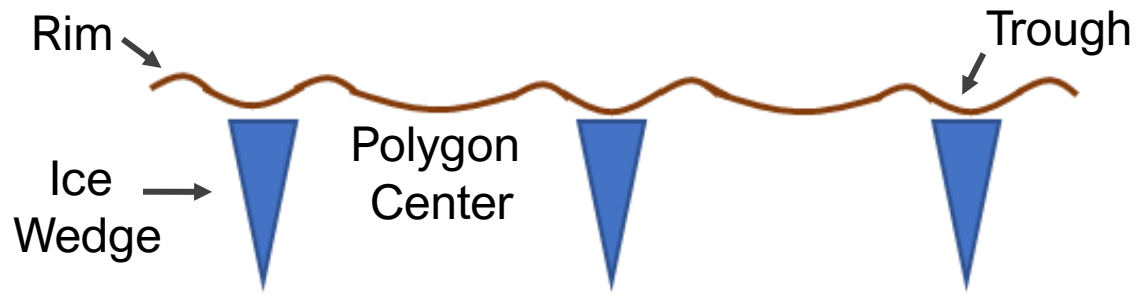




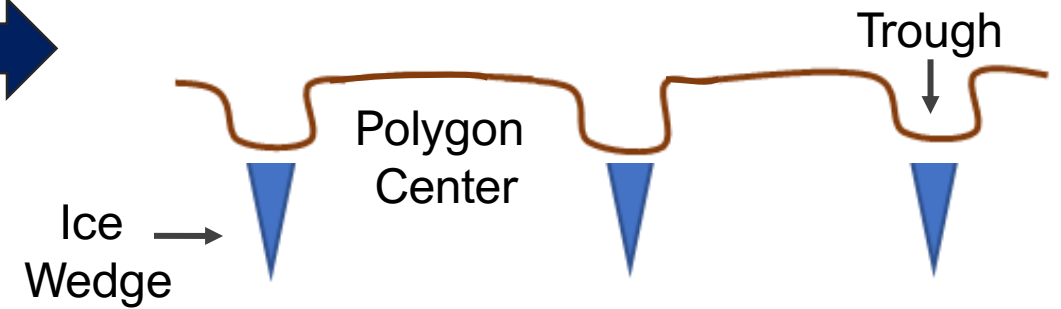
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## Low-Centered Polygons



## High-Centered Polygons





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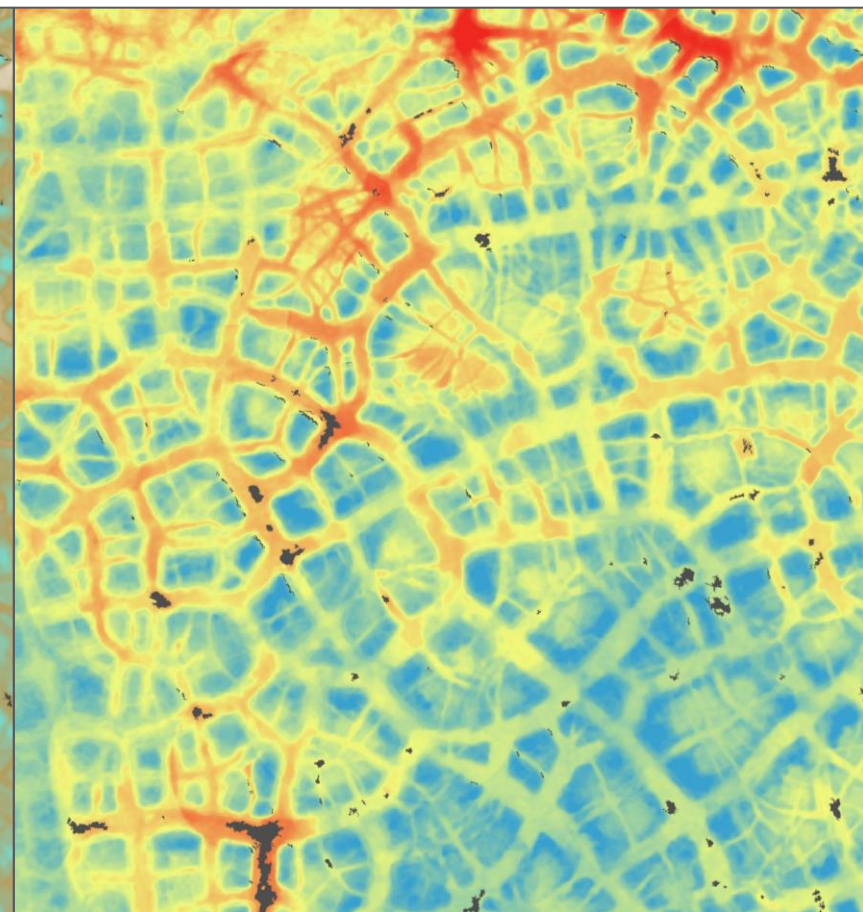
UAV Image Mosaic of  
High-centered Polygons



Micro-Topographic Index (MTI)  
Map



Modelled Ground Temperatures at  
15 cm depth



40 m



0 m  
-1.06 m  
-2.12 m



Surface  
Water



-5.15 °C  
-6.23 °C  
-7.30 °C



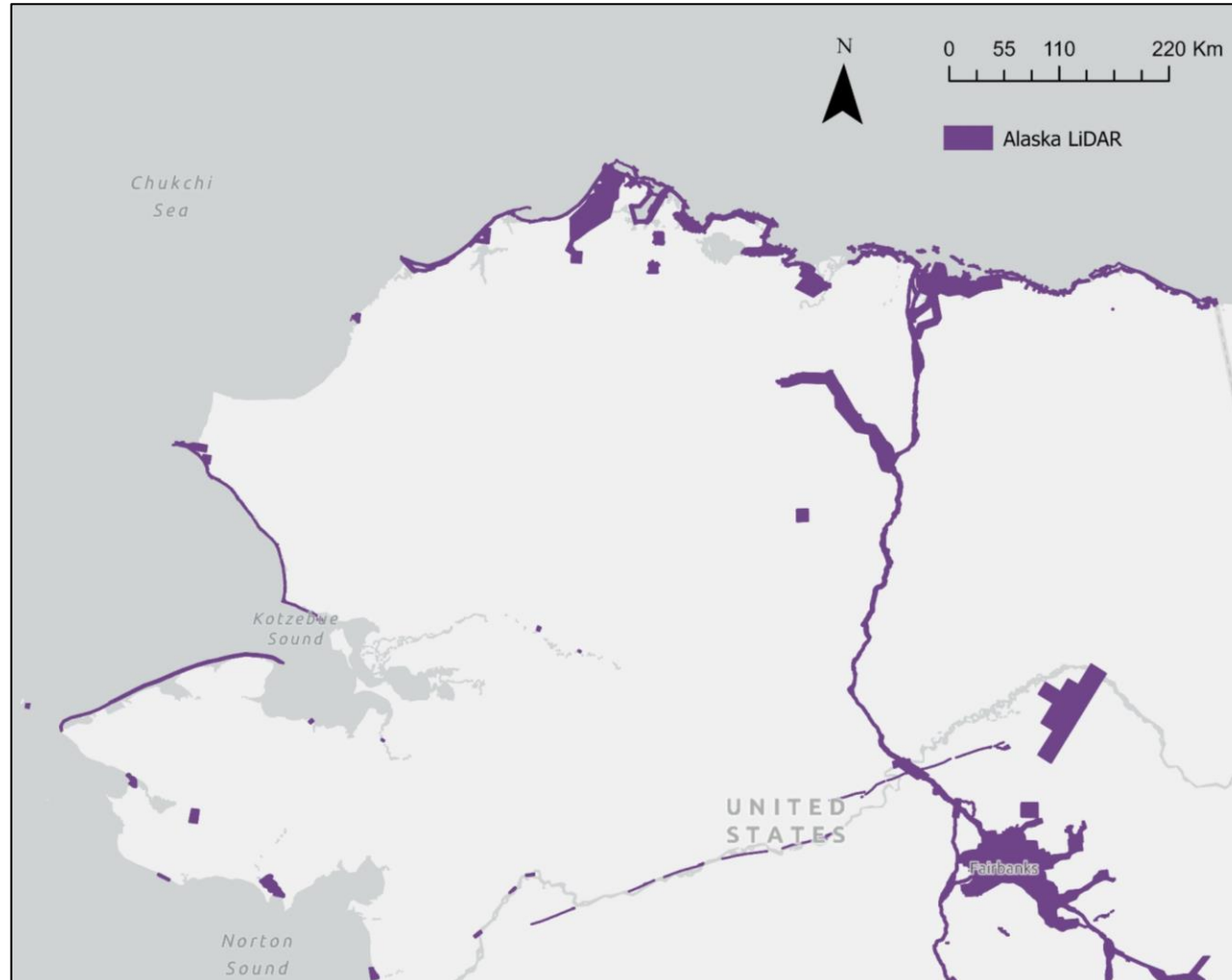
Surface  
Water



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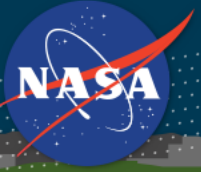


## LiDAR Datasets in Alaska





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## Thank you!

**Melissa Ward Jones**

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