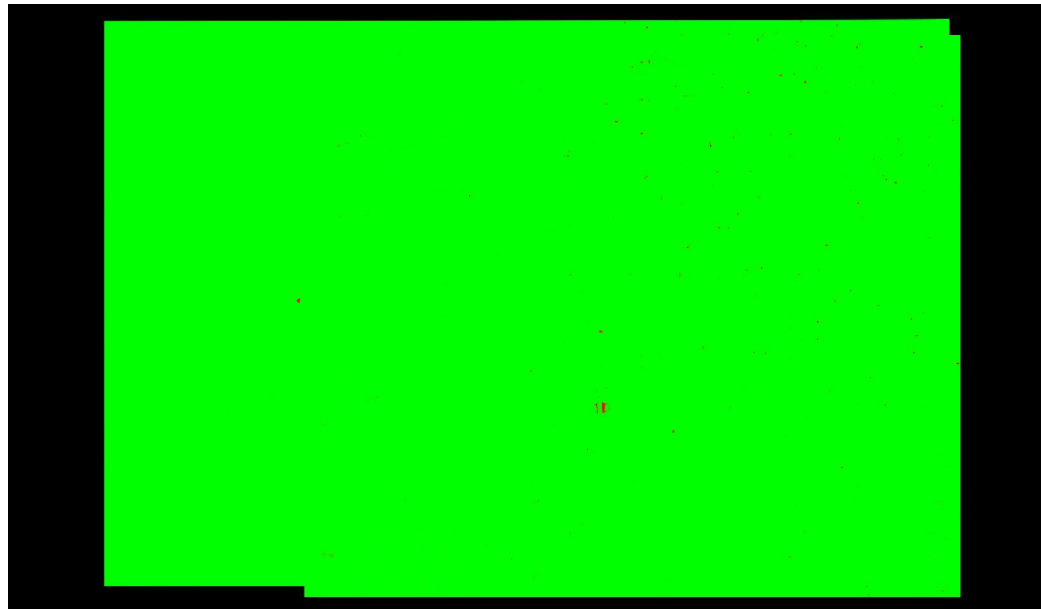The purpose of the addition section C-4.2 is to analyze, report, and summarize alternative density testing techniques that are sometimes used in the lidar community. Focus should be made on comparing the results of these testing methodologies versus the current USGS LBS v 1.3 testing method (C-4.1). Note the similar results using the Nyquist sampling criteria and often dissimilar results of using the straight grid method. An emphasis is strongly recommended to examine the difference of how varying grid cell sizes affect the results when using the grid method.

C-4.2 Grid Cell Size Based on Nyquist Sampling Criteria (2 x Required NPS) Including Overlap Bit Flagged Points

QL2 selected   Required QL2 NPS <= 0.71 meters
First return point count computed using a cell size of 1.42 meters (2 x 0.71)

First Return Point Density Map

Color	Description	Percentage of cells by color
🟩	Density greater than or equal to minimum specification of 1 point per cell	99.94
🟥	Density less than minimum specification of 1 point per cell (0 points per cell)	0.06