Deforestation and South East Asia

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1 Introduction

1.1 Objectives

Each student will analyze different sections / regions of SE Asia and determine the amounts of deforestion, estimate Palm plantations area and fire frequency and area – and calculate the carbon loss from the forests and habitat loss for endangered XX?

NOTES from Madi:

Global Forest Watch: `http://www.globalforestwatch.org/`

Forest monitoring designed for action

Global Forest Watch offers the latest data, technology and tools that empower people everywhere to better protect forests.

1.2 Methods

We (Madi? :-)) have created a grid of southeast Asia that we will sample from for the project. Each student will recieve XX random locations from the grid to analyze.

Let's say there will be 1,000,000 grids, each each with about 5 square km to analyze. Students do 5 each. 5*5*15 students, 45 km2 that a sampling rate of 0.0075%. That would be pretty respectable, for a class project!

Comparing LandSAT images between 19XX and 2017, students will draw polygons around palm plantations and identify recently burned areas. Students will also measure the total land area in the grid. For each grid sample students will record information to fill out Table 1.

Table 1: Data Entry Table

GRID ID	Area Analyze (km2)	Palm (km2)	Recently Burned (km2)
-9999	XX	XX	XX

2 Results

Students will combine their results to create a table that includes the following information:

Country	Total Area (km2)	Area Analyzed	% Palm	% Recently Burned
Cambodia	181,035			
Indonesia	1,904,569			
Loas	236,800			
Malaysia	330,803			
Myanmar	676,578			
Philippines	300,000			
Singapore	716			
Thailand	513,120			
Vietnam	331,212			

using QGIS or ArcMap or ???

Madi suggests we use ArcGIS (ESRI's web based platform). `http://claremont.maps.arcgis.com/home/`

Question: Does CUC have student accounts for this? Marc has emailed Warren to find out.