Electronic Supplementary material for:
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Online Resource 1

Online Table 1. Cover classes from the ESA CCI Land Cover Project used in the present study

Layer in present study	**Land cover classes from ESA CCI- LCP**	**Description of cover classes from ESA CCI-LCP**
Agriculture	10 20 30	Cropland, rainfed Cropland, irrigated or post-flooding Mosaic cropland (> 50%)/natural vegetation (tree, shrub, herbaceous cover < 50%)
Intact forest	50 60 70 80 90 160 170	Tree cover, broadleaf, evergreen, closed to open (>15 %) Tree cover, broadleaf, deciduous, closed to open (>15 %) Tree cover, needleleaf, evergreen, closed to open (>15 %) Tree cover, needleleaf, deciduous, closed to open (>15 %) Tree cover, mixed leaf type (broadleaf and needleleaf) Tree cover, flooded, fresh or brackish water Tree cover, flooded, saline water
Degraded forest	40 100 110 120 150 180	Mosaic natural vegetation (tree, shrub herbaceous cover) (>50%)/ cropland (<50%) Mosaic tree and shrub (>50%) / herbaceous cover (<50%) Mosaic herbaceous cover (>50%) / tree and shrub (<50%) Shrubland Sparse vegetation Shrub or herbaceous cover, flooded, fresh/saline/brackish water

Online Resource 2

Comparison of the present study with published estimates for deforestation and land cover change.

Our estimate for percent forest loss in Indonesian peatlands appears lower than that of Miettenen et al. (2012). This results in part from a difference in calculation. For example, for Sumatra we estimated forest loss in peatlands from 2000-2015 of 24.2% as a percentage of the total mapped peatland area of 55,914 km^2, or 13,332 km^2. Miettenen et al. (2012) estimated similar losses from 2000-2010 of 12,716 km^2, but estimated a much higher percentage (41%) because they used a base value of the existing forested peatlands as of 2000, rather than the total area of peatland. It is also likely that our threshold of 50% conversion, and aggregation effects in our 1 km^2 map units noted earlier might underestimate total forest cover loss by not accounting for smaller patches of deforestation.

Similarly, our estimate of area in specific classes of plantation forestry varied from those of Miettinen et al. (2016). For example, in Sumatra they found 13,158 km^2 of oil palm, 10,743 km^2 of pulp wood, and 154 km^2 of other/unknown plantations. In contrast, we found 10,129 km^2 of oil palm, 4,530 km^2 of tree plantations, and 8,795 km^2 of other/unknown plantations. However, total estimated area of plantations on peatlands was similar, with 24,055 km^2 for Miettinen et al. (2016) and 23,454 km^2 in the present study, suggesting that much of the difference arose from the classification to type of plantation.

References

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Miettinen J, Shi C, Liew SC (2016) Land cover distribution in the peatlands of Peninsular Malaysia, Sumatra and Borneo in 2015 with changes since 1990. Glob Ecol Cons 6:67-78.