Can GIS be used to identify deer yards?

In order to find out if GIS can be used to create deer yards, I obtained the criteria for a deer yard from the NH Fish and Game Department. The criteria consists of areas of coniferous forest larger than 10 acres in size and officials suggest that south facing slopes are good wildlife habitat. Coniferous forest data was obtained from GRANIT, and a GIS analysis was employed to derive slope and aspect.

Since I am familiar with Orford, NH, I used that as a test location. I made a map of coniferous forests larger than 10 acres, and inspected the sites to determine whether there were actually deer yards in the identified locations.

After I ground-truthed the areas, I compared the actual deer yard locations to the slope and aspect information provided by NH Fish & Game officials to see what, if any, effect they had on the locations.

I conclude that GIS can be a helpful tool in identify potential deer yards. There are limitations such as the frequency with which data layers are updated. GIS only identifies areas where deer might yard, so all areas need to be ground-truthed, to find out if deer yards are really present.

Potential Deer Yards for the State of New Hampshire

Potential Deer Yards in Orford, NH

Legend
- No Deer Yards
- Deer Yards
- Potential Deer Yards
- Lakes and Ponds
- Rivers and Streams
- Roads

There are twenty potential deer yards in the town of Orford, NH that were identified using GIS. These locations were ground-truthed and identified on this map to depict where there are actually deer yards.