

## Mathematics 1001H – Precalculus Mathematics

TRENT UNIVERSITY, Summer 2016

### Assignment #4

And now for something a little different ...

*Due on Tuesday, 7 June, 2016.*

The planet Logopolis is inhabited only by jedi and sith. Jedi always tell the truth, and sith always lie. You meet five inhabitants: Boz, Alik, Zip, Marg, and Zoy.

- Boz says that Zip and Zoy are sith.
- Alik says, “Zoy is a sith and I am a jedi.”
- Zip says that at least one of the following is true: that Marg is a jedi or that Alik is a jedi.
- Marg says that it’s false that Boz is a sith.
- Zoy says that at least one of the following is true: that Marg is a jedi or that Boz is a sith.

1. Determine who is a jedi and who is a sith as best you can. [10]

NOTE: This is a slight adaptation of puzzle #151 at:

<http://philosophy.hku.hk/think/logic/knights.php>

(No solutions are given there, but there are many more such puzzles. :-)