

**ENGINEER 1D04**  
**Engineering Computation**  
**McMaster University, Winter 2010**

**Lab 7 Marked Assignment 3 Solution**  
**Wednesday Lab**

Revised: 4 March 2010

**Correctness**

Interval	Result
$[0, 3.14]$	“Definitely Attains an Internal Maximum”
$[3.14, 6.28]$	“Likely does not Attain an Internal Maximum”

**Design Question**

No. If the method `f` implemented a different continuous function, the program should work correctly without any other modifications.

**Testing Question**

An example of an closed interval where  $f$  does not attain an external maximum is  $[\pi, 2\pi]$  (because the interior of this interval contains a local minimum of the function).