

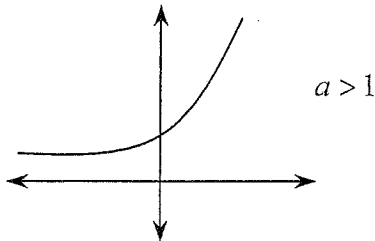
## Test 4 Part 1 Study Guide

### Sec 5.1 Inverse Functions

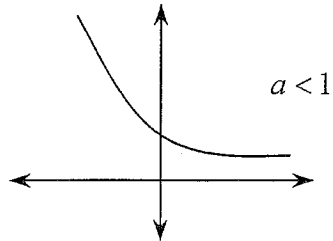
- Notation: if  $f(a) = b$ ,  $f^{-1}(b) = a$
- Graphs: symmetry of  $f$  and  $f^{-1}$  about  $y = x$
- Given  $f(x)$ , find  $f^{-1}(x)$ .
- Domain and range of  $f$  and  $f^{-1}$ .

### Sec 5.2, 5.3 Worksheet F / Exponential and Log Functions

- Graphs of  $f(x) = a^x$ ,  $a > 0$ .

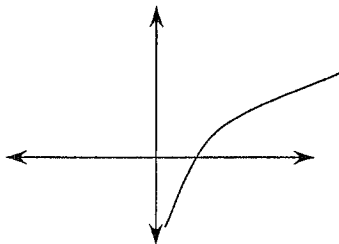


exponential growth  
includes  $e^x$



exponential decay

- Graphs of  $\log x$ ,  $x > 0$ . Includes  $\ln x$ .



- Transformations of exponential and log functions.
  - Exponential: shift y-int and HA
  - Log: shift x-int and VA