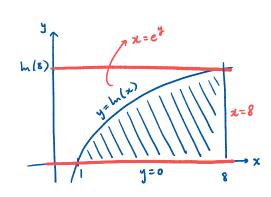
## 3 If we have time...

**Example 6.** Sketch the region of integration *D* for the double integral  $\int_1^8 \int_0^{\ln(x)} f(x, y) \, dy \, dx$ . Reverse the order of integration.



$$\int_{1}^{8} \int_{0}^{\ln(2)} f(x,y) dy dx$$

$$= \int_{0}^{\ln(8)} \int_{e^{2}}^{8} f(x,y) dx dy$$