

#### SET DIFFERENCES

# Why

We want to consider the elements of one set which are not contained in another set.

### **Definition**

Let A and B denote sets. The difference between A and B is the set  $\{x \in A \mid x \notin B\}$ . It is not necessary that  $B \subset A$ .

#### Notation

We denote the difference between A and B by A - B.

## **Properties**

The following are straightforward.<sup>1</sup>

Proposition 1.  $A - \emptyset = A$ 

Proposition 2.  $A - A = \emptyset$ 

<sup>&</sup>lt;sup>1</sup>Accounts will appear in future editions.

