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**Definition 0.0.1.** [?, Definition 1.1.1] A *formal language*  $\mathcal{L}$  in first order logic is given by the following:

1. A set  $\mathcal{F}$  of functions  $f$  of  $n_f$  variables, with  $n_f \in \mathbb{Z}^+$  a positive integer,
2. A set  $\mathcal{R}$ , of  $n_r$ -ary relations  $r$ , with  $n_r \in \mathbb{Z}^+$  a positive integer,
3. A set  $\mathcal{C}$  of constants.