

LGIC 010 & PHIL 005
Definitions for Practice Examination II
Spring Term, 2016

- If X and Y are sets, $X \triangle Y = \{a \mid (a \in X \text{ and } a \notin Y) \text{ or } (a \in Y \text{ and } a \notin X)\}$ (the *symmetric difference* of X and Y).
- A list of pure monadic schemata is *succinct* if and only if no two schemata on the list are equivalent.
- A pure monadic schema *implies a list of schemata* if and only if it implies every schema on the list.
- The *power* of a pure monadic schema is the length of a longest succinct list of pure monadic schemata it implies.
- If X is a finite set, we write $|X|$ for the number of members of X .
- If S is a schema, we write $\text{mod}(S, n)$ for the set of structures A such that $A \models S$ and $U^A = \{1, \dots, n\}$.
- \mathbb{Z}^+ is the set of positive integers $\{1, 2, 3, \dots\}$.
- $\text{Spec}(S) = \{n \in \mathbb{Z}^+ \mid \text{mod}(S, n) \neq \emptyset\}$.