Introduction to Logical Reasoning

Workshop on Analyzing Categorical Syllogisms

Part I: Each of the following problems presents a categorical syllogism in standard symbolic form. For each of these syllogisms, (1) state the formal identification of the syllogism's form and (2) use Venn diagrams of the premises and the conclusion to determine whether the syllogism is valid or invalid.

1.   1. No *P* is *M*.
     2. All *S* is *M*.
     ∴ No *S* is *P*.

2.   1. Some *M* is not *P*.
     2. Some *S* is *M*.
     ∴ Some *S* is *P*.

3.   1. No *P* is *M*.
     2. Some *M* is *S*.
     ∴ Some *S* is not *P*.

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Part II: Each of the following problems presents a categorical syllogism. For each of these syllogisms: (1) identify the major term (*P*), the minor term (*S*), and the middle term (*M*); (2) put the syllogism into standard symbolic form; (3) state the formal identification of the syllogism's form; and (4) use Venn diagrams of the premises and the conclusion to determine whether the syllogism is valid or invalid.

1. Some investigative journalists are not courageous people, for all social and political activists are investigative journalists, and some social and political activists are not courageous people.

2. All roses are flowers, and some flowers fade quickly. Therefore, some roses fade quickly.