



Figure 1: ERD for Problem 4

Non

concerning entity type(s) or relations	Violation	Solution
1 and 2	Redundant FK violation	Remove attribute 1-1 from entity type 2
2 and 4	Redundant FK violation	Remove attribute 4-1 from entity type 2
6	PK rule violation	Remove primary key from Attribute 6-2 Remove primary key from Attribute 6-3
2	Attribute Name rule violation	Remove double attribute 2-1 or change into 2-2
6	Weak entity type rule violation	Change weak entity type into regular entity type  Or change identification cardinality of rel 7 into 1-1 cardinality near Entity 7 instead of 1-M
Rel 7	Identifying relationship rule	Making relationship non-identifying
Rel 6	Identifying relationship rule + 2 times relationship 6 used	Making relationship non-identifying  + change naming of 1 of the 2 rel6