

Scout: A member of a squad who is assigned a role to contribute to in order to prepare a Meal. Since a scout can only perform one task per meal, it stands to reason that the multiplicity between Scout and Assignment is 1..1 towards Assignment and since many different Scouts can have the same Assignment, and at least one Scout needs to perform tasks, the multiplicity going towards Scout should be 1..*.

Meal: A Meal is prepared by many scouts who perform assignments so that everyone may eat. A Meal requires one or more Assignments to be performed which is why the multiplicity is 1..*.

Assignment: A Task that is to be performed by a Scout in order to prepare a Meal. An Assignment consists of one Task, but can have many of the same Task since the same Tasks can be given to different Scouts. There is always at least one task to be performed for a meal but there is a theoretically large amount of tasks that may need to be performed for a meal, so that is why the multiplicity going towards meal is 1..*. Since there is always at least one Scout performing a task, but there can also be many, the multiplicity going from Assignment to Scout should be 1..*.

Task: A specific action or list of actions that comprise an Assignment. Though an Assignment is just one task, there may be multiple Assignments with the same Tasks, which is what the multiplicity going from Task to Assignment is 1..*.