

# **HOMEWORK 1 - GRADING KEY**

# 1. (17 points) Documentation and coding style:

- Name, ID number and recitation at the top of ALL java files [2 points]
- Precise and correct specifications[5 points]
- Indentation[3 points]
- Variable names[2 points]
- Javadoc Style \*(see NOTE). [5 points]

NOTE 1: You only need to submit your \*.java files. We will use the javadoc \*.java command to create the javadoc files.

NOTE 2: YOUR ASSIGNMENT WILL NOT BE GRADED if you submit only \*.class files.

NOTE 3: YOUR ASSIGNMENT WILL NOT BE GRADED if you use ArrayList, Vector or any predefined Java API Data Structures.

### 2. (13 points) Source code:

- Implementation done as specified (additional methods are OK) [4 points]
- Coding style: flexible, extensible, good use of methods and avoid duplicate code. [5 points]
- Throw an exception back to the calling method(s) if a precondition is violated. [4 points]

#### 3. (65 Points) Program Correctness

- Program compiles without any errors. [6 points]
- The following menu items are implemented correctly:
  - A) Add Player. [6 points]
  - G) Get Player stats. [6 points]
  - L) Get leader in a stat. [6 points]
  - R) Remove a player. [6 points]
  - P) Print all players. [6 points]
  - S) Size. [3 points]
  - T) Select team [3 points]
  - C) Clone team [6 points]
  - E) Team equals [6 points]
  - U) Update stat. [5 points]
  - Q) Quit. [1 point]
- Erroneous input handled "gracefully." (Appropriate Error messages displayed to the user.) [5 points]

# 4. (5 Points) Program efficiency:

• size and getPlayer should be O(1) and all other methods should be O(n). [5 points]