## Generating "Quick \& Dirty" Player Stats

This document describes a basic system for calculating reasonable offensive player stats resulting from a game of Masters of the Gridiron.

## Default Stats

Some stats are awarded to each player automatically, based on ratings, regardless of how the game played out. For all calculations, truncate all decimals. For example: 97 / 10=9.7 =9 (after rounding).


## Game Stats

In addition to the "default stats", stats are awarded to players based on game events.
Use the following rules to determine the "key skill player" on each play:

| Stat Used | Position | Key Skill Player |  |
| :--- | :---: | :---: | :---: |
| Rushing, Goal Line, Receiving or Red Zone | WR/TE/RB/FB | Current Player Card |  |
| Rushing or Goal Line | QB | Current Player Card (QB) |  |
| Passing or Red Zone | QB | Most recently played WR/TE* |  |
| Pass Blocking | Any | Most recently played WR/TE* |  |
| Run Blocking | Any | Most recently played RB* |  |

*If the specified position (WR/TE or RB) hasn't been played yet, don't assign "Key Skill Player" stats for this play. (It is assumed that such stats accrued to a player that is not in your deck, such as a $3^{\text {rd }}$ wide receiver).

Then, award the following stats, depending on the play type and result:

| Play Type | Result | Stats (Quarterback) | Stats (Key Skill Player) |
| :--- | :---: | :---: | :---: |
| Passing TD | Successful | 6-for-7, 80 yards, 1 TD | 5 receptions for 70 Yards and 1 TD |
| Passing FG | Successful | 2-for-3, 20 yards | 2 receptions for 20 yards |
| Rushing TD | Successful | - | 7 rushes for 50 yards and 1 TD |
| Rushing FG | Successful | - | 3 rushes for 20 yards |
| Passing TD |  |  |  |
|  | Failed | 0-for-3, 1 interception | - |

[^0]| Passing FG ${ }^{1}$ | Failed | 0 -for-3 | - |
| :--- | :--- | :---: | :---: |
| Rushing TD |  |  |  |
| Rushing FG |  |  |  |
|  | Failed | Failed | - |
| 3 rushes for 3 yards |  |  |  |

## Example of Stat Generation

First, we record the default stats for each player. These are the same for each player for each game, simplifying the record-keeping:

| Player (Season) | Key Rating | Default Stats |
| :---: | :---: | :---: |
| Russell Wilson (2013) | 79 (Passing) | 7 completions in 11 attempts for 79 yards |
| Russell Wilson (2013) | 75 (Rushing) | 6 rushes for 25 yards |
| Golden Tate (2013) | 73 (Receiving) | 3 receptions for 23 yards |
| Doug Baldwin (2013) | 70 (Receiving) | 3 receptions for 20 yards |
| Jermaine Kearse (2013) | 57 (Receiving) | 1 reception for 7 yards |
| Luke Willson (2013) | 57 (Receiving) | 1 reception for 7 yards |
| Marshawn Lynch (2013) | 79 (Rushing) | 6 rushes for 29 yards |
| Marshawn Lynch (2013) | 61 (Receiving) | 2 receptions for 11 yards |

Next, we record the results of each scoring attempt when we play the game. If we place each player card with each offensive play, we don't need to use pencil and paper until after the game is over.

| \# | Player | Pos | Play | Success | Stats Awarded |
| :---: | :---: | :---: | :---: | :---: | :--- |
| $\mathbf{1}$ | Breno Giacomini | T | Pass TD | No | Wilson: 0 -for-3, 1 interception |
| $\mathbf{2}$ | James Carpenter | G | Rush FG | Yes | Lynch: 3 rushes for 20 yards |
| $\mathbf{3}$ | Golden Tate | WR | Pass TD | Yes | Wilson: $6 / 7,80$ yds, 1 TD; Tate: 6 rec, 80 yds, 1 TD |
| $\mathbf{4}$ | Russell Wilson | QB | Rush FG | Yes | Wilson: 3 rushes for 20 yards |
| $\mathbf{5}$ | J. R. Sweezy | G | Rush TD | No | Lynch: 3 rushes for 3 yards |
| $\mathbf{6}$ | Doug Baldwin | WR | Pass FG | No | Wilson: 0 -for-3 3 |
| $\mathbf{7}$ | Jermaine Kearse | WR | Pass TD | Yes | Wilson: $6 / 7,80$ yds, 1 TD; Kearse: 6 rec, 80 yds, 1 TD |
| $\mathbf{8}$ | Paul McQuistan | T | Rush FG | No | Lynch: 3 rushes for 3 yards |
| $\mathbf{9}$ | Marshawn Lynch | RB | Rush TD | Yes | Lynch: 7 rushes for 50 yards, 1 TD |

Finally, we add these stats to the Default Stats:

|  | Total Stats |  |
| :---: | :---: | :---: |
| Russell Wilson (Passing) | 19/31 for 239 yards, 2 TD, 1 Int | Passer Rating: 93.6 |
| Russell Wilson (Rushing) | 9 rushes for 45 yards | 5.0 Yards / Rush |
| Golden Tate | 9 receptions for 103 yards, 1 TD |  |
| Doug Baldwin | 3 receptions for 20 yards |  |
| Jermaine Kearse | 7 receptions for 87 yards, 1 TD |  |
| Luke Willson | 1 receptions for 7 yards |  |
| Marshawn Lynch (Rushing) | 25 rushes for 115 yards, 1 TD | 4.6 Yards / Rush |

[^1]
## Marshawn Lynch (Receiving) 2 receptions for 11 yards

## Stat Randomization

For anyone played with a running play, flip one playbook card. Add 3 rushes for a FG, 7 for a TD, plus 3 yards per rush. Then add the bonus (if any) as rushing yards.

For any skill player played with a passing play, flip two playbook cards and add a reception for each TD. Then add the bonuses (if any) as receiving yards.

## Advanced Stat Randomization (Dice-Based)

The above system generates realistic statistics for a 16-game season, but can produce repetitive stats on a game by game basis. For example, Marshawn Lynch will have exactly 2 receptions and 16 receiving yards in any game in which he is not directly involved in a pass play.

Rushes, receptions, rushing yards and receiving yards can be randomized using two six-sided dice. Find the current stat total in the left column and adjust it using the table below.

| Stat Total | Die Roll (2d6) |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\mathbf{2}$ | $\mathbf{3}$ | $\mathbf{4}$ | $\mathbf{5}$ | $\mathbf{6}$ | $\mathbf{7}$ | $\mathbf{8}$ | $\mathbf{9}$ | $\mathbf{1 0}$ | $\mathbf{1 1}$ | $\mathbf{1 2}$ |
| $\mathbf{1 - 4}$ | -2 | -1 | -1 | - | - | - | - | - | +1 | +1 | +2 |
| $\mathbf{5 - 9}$ | -2 | -2 | -1 | -1 | - | - | - | +1 | +1 | +2 | +2 |
| $\mathbf{1 0 - 2 9}$ | -5 | -4 | -3 | -2 | -1 | - | +1 | +2 | +3 | +4 | +5 |
| $\mathbf{3 0 +}$ | -10 | -7 | -5 | -3 | -1 | - | +1 | +3 | +5 | +7 | +10 |

## Error Checking

If you use this system, you may need to "sanity check" your results. For example:

- Stats for "Rushes" and "Receptions" cannot be reduced below zero
- If a player has zero Rushes, he must have zero Rush Yards


[^0]:    ${ }^{1}$ Also, whenever an offensive lineman's Pass Blocking rating is defeated, record a sack.

[^1]:    ${ }^{2}$ And, if a running back's rating (Rushing or Goal Line) is exactly matched by the defense, record a fumble.

