PL Fixtures - (Betfair) Odds & (Implied) Probabilities

Skip to pages 3 and 4 to see the results.

```
library(XML);
library(xtable);
library(knitr);
```

Reading Data from http://www.betfair.com/exchange/football/competition?id=31

```
matches_URL <- "https://www.betfair.com/exchange/football/competition?id=31"

# For some reason, Betfair has changed its design recently.
# It's not a table anymore
# matches_Table <- readHTMLTable(matches_URL)

# ReadLine and Parse the HTML page.

# download.file(matches_URL, "aa.html")
matches_html  <- readLines("aa.html")

# matches_html  <- readLines(matches_URL)

matches_parse <- htmlTreeParse(matches_html,useInternal=TRUE)
```

Cleaning Data:

```
# Extract the relevant bits.
data_odds_back <- xpathSApply(matches_parse,
                              "//button[@class = 'bet-button back cta cta-back i13n-ltxt-FltBetSlpB i13
                              , xmlValue)

data_odds_lay <- xpathSApply(matches_parse,
                             "//button[@class = 'bet-button lay cta cta-lay i13n-ltxt-FltBetSlpL i13n-Sp
                             , xmlValue)

data_home <- xpathSApply(matches_parse, "//span[@class = 'home-team']", xmlValue)

data_away <- xpathSApply(matches_parse, "//span[@class = 'away-team']", xmlValue)

# Otherwise team names would be interpreted as factors.
options(stringsAsFactors = FALSE)

# make "odds" numeric

data_back <- data.frame(
    apply(
        matrix(data_odds_back, ncol = 3, byrow = TRUE)
        , 2, as.numeric))
```

```
data_lay <- data.frame(
    apply(
        matrix(data_odds_lay, ncol = 3, byrow = TRUE)
        , 2, as.numeric))

# Matches data.frame
all_matches <- cbind(data_home, data_away, data_back, data_lay)
colnames(all_matches) <-
    c("Home", "Away", "H_B", "D_B", "A_B", "H_L", "D_L", "A_L")
```

Creating probabilities data.frame (a rough estimate + normalisation). The results are reported with 0 decimal points.

```
# Output data.frames

H <-
    round((100/all_matches[,3]+ 100/all_matches[,6])/rowSums(1/all_matches[,3:8])
          , digits = 0)
D <-
    round((100/all_matches[,4]+ 100/all_matches[,7])/rowSums(1/all_matches[,3:8])
          , digits = 0)
A <-
    round((100/all_matches[,5]+ 100/all_matches[,8])/rowSums(1/all_matches[,3:8])
          , digits = 0)

prob_output <- data.frame(
    "Home" = all_matches[,1], H, D, A, "Away" = all_matches[,2])


odds_output <- data.frame(cbind(
    "Home" = all_matches[,1],
    H = paste(all_matches[,3], all_matches[,6], sep = "/"),
    D = paste(all_matches[,4], all_matches[,7], sep = "/"),
    A = paste(all_matches[,5], all_matches[,8], sep = "/"),
    "Away" = all_matches[,2])
    )

odds_output <- odds_output[1:8, ]

prob_output <- prob_output[1:8, ]

prob_output <-
    prob_output[order(apply(prob_output[,2:4],1, max)),]
```

Home	H	D	A	Away
Burnley	38	30	32	Swansea
West Brom	28	30	41	Southampton
Liverpool	31	28	41	Man City
West Ham	46	29	25	C Palace
Stoke	49	29	22	Hull
Newcastle	50	28	22	Aston Villa
Arsenal	63	22	15	Everton
Man Utd	72	19	9	Sunderland

Table 1: Coming Fixtures (Implied) Probabilities

	Home	H	D	A	Away
1	West Ham	2.18/2.2	3.45/3.5	3.9/3.95	C Palace
2	Burnley	2.62/2.64	3.35/3.4	3.05/3.15	Swansea
3	Man Utd	1.39/1.4	5.2/5.3	10.5/11	Sunderland
4	Newcastle	2/2.02	3.5/3.55	4.6/4.7	Aston Villa
5	Stoke	2.02/2.06	3.4/3.45	4.5/4.7	Hull
6	West Brom	3.5/3.6	3.25/3.3	2.4/2.42	Southampton
7	Liverpool	3.15/3.25	3.6/3.65	2.44/2.46	Man City
8	Arsenal	1.59/1.61	4.5/4.6	6.4/6.8	Everton

Table 2: Coming Fixtures Odds