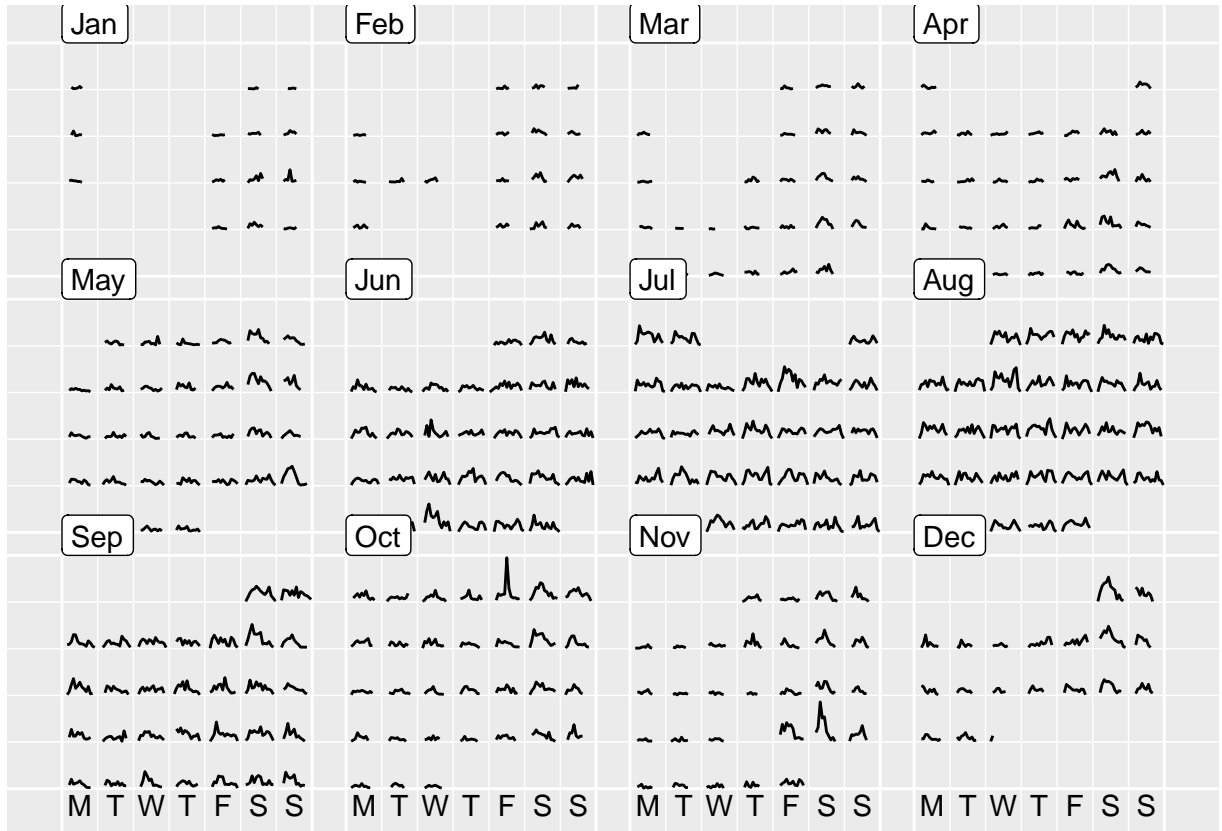


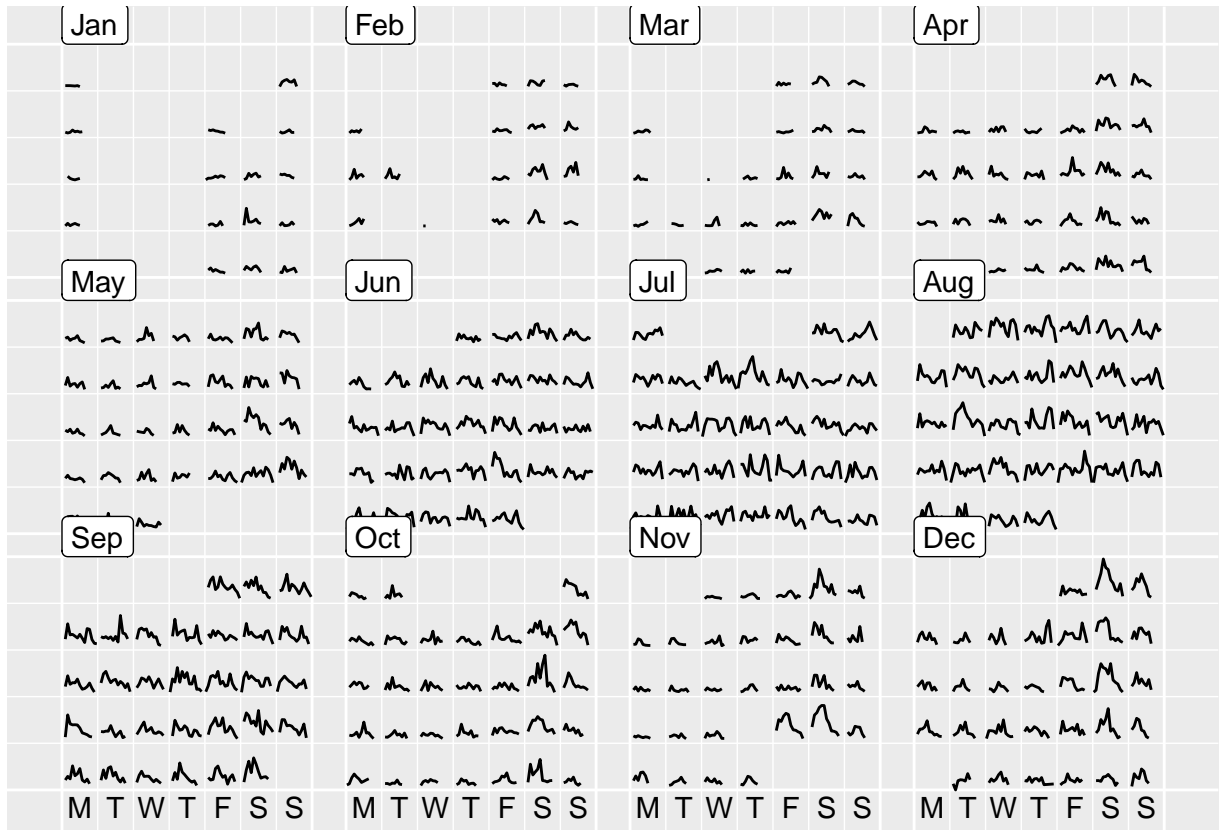
Staffing Analysis

Allocate Analytics

March 16, 2018

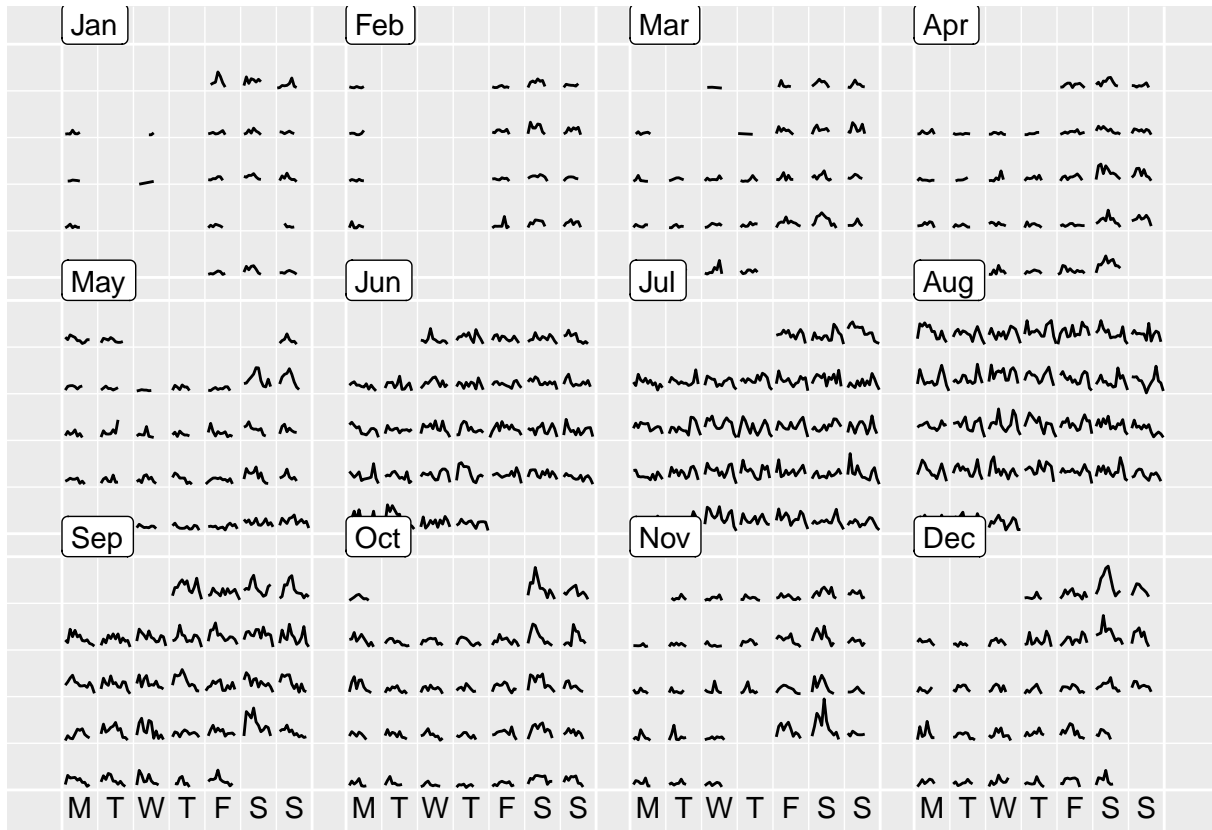


[1] 3 7 4 2 18 15 8 14 13 12 19



Comments and Trends

1 Almost no big days until 2nd weekend of April and then it's Fri, Sat, Sun 2 Weekdays start getting consistently big after Memorial Day 3 Weekdays slow down after Labor Day 4 October weekdays even slower than Sept. 5 Beginning around Halloween Saturday is really the main big weekend day until the week before Xmas and except for Thanksgiving weekend



Off Peak Minimum Staffing

##	Department	Category	Supplier	Item
## 1	COUNTER CARD	GOOD LUCK	CASPARI INC	128335
## 2	COUNTER CARD	BIRTHDAY	SUN DAY GREETINGS	111493
## 3	COUNTER CARD	BIRTHDAY	SHANNON MARTIN	118749
## 4	COUNTER CARD	BIRTHDAY	SHADE TREE GREETINGS	119173
## 5	COUNTER CARD	BIRTHDAY	PALM PRESS	120571
## 6	COUNTER CARD	BIRTHDAY	ARCHELAUS	88233

##	Description	Qty.Sold	Total.Sales	Transaction
## 1	*SHAMROCKS	1	2.17	1931420
## 2	A LITTLE BIRDIE	1	2.75	1931421
## 3	IN DOG BEERS	1	2.95	1931421
## 4	BOUGHT THE DRESS BEFORE VODKA	1	3.25	1931421
## 5	BUNNY IN MAILBOX	1	2.95	1931421
## 6	HAPPY BIRTHDAY TO MY.....	1	2.95	1931421

##	Date.Sold	Register	Cashier	Year	Month	Dept.By.Year
## 1	2016-02-15	3	Diana Wunder	2016	2	COUNTER CARD 2016
## 2	2016-02-15	3	Diana Wunder	2016	2	COUNTER CARD 2016
## 3	2016-02-15	3	Diana Wunder	2016	2	COUNTER CARD 2016
## 4	2016-02-15	3	Diana Wunder	2016	2	COUNTER CARD 2016
## 5	2016-02-15	3	Diana Wunder	2016	2	COUNTER CARD 2016
## 6	2016-02-15	3	Diana Wunder	2016	2	COUNTER CARD 2016

##	Categ.By.Year	Date.Sold.Round	Hour	Weekday
## 1	GOOD LUCK 2016	2016-02-15	12:00:00	12

```
## 2 BIRTHDAY 2016 2016-02-15 12:00:00 12 2
## 3 BIRTHDAY 2016 2016-02-15 12:00:00 12 2
## 4 BIRTHDAY 2016 2016-02-15 12:00:00 12 2
## 5 BIRTHDAY 2016 2016-02-15 12:00:00 12 2
## 6 BIRTHDAY 2016 2016-02-15 12:00:00 12 2
```

```
##      Department      Category      Supplier      Item
## 7962 COUNTER CARD      BIRTHDAY      PAPYRUS 133026
## 7963      BOOKS ACTIVITY & STICKER BOOKS      DOVER PUBLICATIONS INC 75403
## 7964 COUNTER CARD      BIRTHDAY SELLERS PUBLISHING, INC. 129249
## 7965 COUNTER CARD      BIRTHDAY SELLERS PUBLISHING, INC. 106658
## 7966      JEWELRY      CHARM      SUNSHINE DAYDREAM 130953
## 7967      JEWELRY      NECKLACE      ANGIE OLAMI 125384
```

```
##      Description Qty.Sold Total.Sales Transaction
## 7962      OBAMA AUTOGRAPH      1      3.59      1935023
## 7963      GLITTER BUTTERFLIES TATTOOS      1      1.99      1935023
## 7964      LIVE IN THE MOMENT COOKIE      1      2.99      1935023
## 7965 OLD LADY AT STUDENT LOAN- BDAY      1      2.99      1935023
## 7966      BEACH CHARM-SM STARFISH      1      12.00      1935019
## 7967 OVAL GLASS W/ FRAME/LABRAD BEA      1      135.00      1935022
```

```
##      Date.Sold Register      Cashier Year Month      Dept.By.Year
## 7962 2016-04-07      4      Alaina Fox 2016      4 COUNTER CARD 2016
## 7963 2016-04-07      4      Alaina Fox 2016      4 BOOKS 2016
## 7964 2016-04-07      4      Alaina Fox 2016      4 COUNTER CARD 2016
## 7965 2016-04-07      4      Alaina Fox 2016      4 COUNTER CARD 2016
## 7966 2016-04-07      3 Justine Hammett 2016      4 JEWELRY 2016
## 7967 2016-04-07      3      Lori DeSorbo 2016      4 JEWELRY 2016
```

```
##      Categ.By.Year      Date.Sold.Round Hour Weekday
## 7962      BIRTHDAY 2016 2016-04-07 16:00:00      16      5
## 7963 ACTIVITY & STICKER BOOKS 2016 2016-04-07 16:00:00      16      5
## 7964      BIRTHDAY 2016 2016-04-07 16:00:00      16      5
## 7965      BIRTHDAY 2016 2016-04-07 16:00:00      16      5
## 7966      CHARM 2016 2016-04-07 15:00:00      15      5
## 7967      NECKLACE 2016 2016-04-07 16:00:00      16      5
```

```
## [1] 9
##      Total.Sales
## 1      3.65
## 2      13.89
## 3      33.46
## 4      44.90
## 5      16.95
## 6      -23.95
## [1] "numeric"
## [1] "numeric"
## [1] 10
##      Total.Sales
## 1      485.02
## 2      1027.00
## 3      226.07
## 4      340.67
## 5      638.97
## 6      378.51
## [1] "numeric"
## [1] "numeric"
```

```

## [1] 11
##   Total.Sales
## 1      716.31
## 2     1329.52
## 3      543.59
## 4     1003.87
## 5     2020.20
## 6      623.19
## [1] "numeric"
## [1] "numeric"
## [1] 12
##   Total.Sales
## 1      566.62
## 2     1478.57
## 3      356.67
## 4      715.74
## 5      723.32
## 6      525.60
## [1] "numeric"
## [1] "numeric"
## [1] 13
##   Total.Sales
## 1      579.67
## 2     1114.88
## 3      226.06
## 4      287.54
## 5      648.11
## 6      753.04
## [1] "numeric"
## [1] "numeric"
## [1] 14
##   Total.Sales
## 1      402.81
## 2     1146.96
## 3      667.20
## 4      744.11
## 5     1228.49
## 6      612.84
## [1] "numeric"
## [1] "numeric"
## [1] 15
##   Total.Sales
## 1      332.67
## 2     1102.85
## 3      336.26
## 4     1047.18
## 5      756.85
## 6      267.75
## [1] "numeric"
## [1] "numeric"
## [1] 16
##   Total.Sales
## 1      349.22
## 2     1134.92

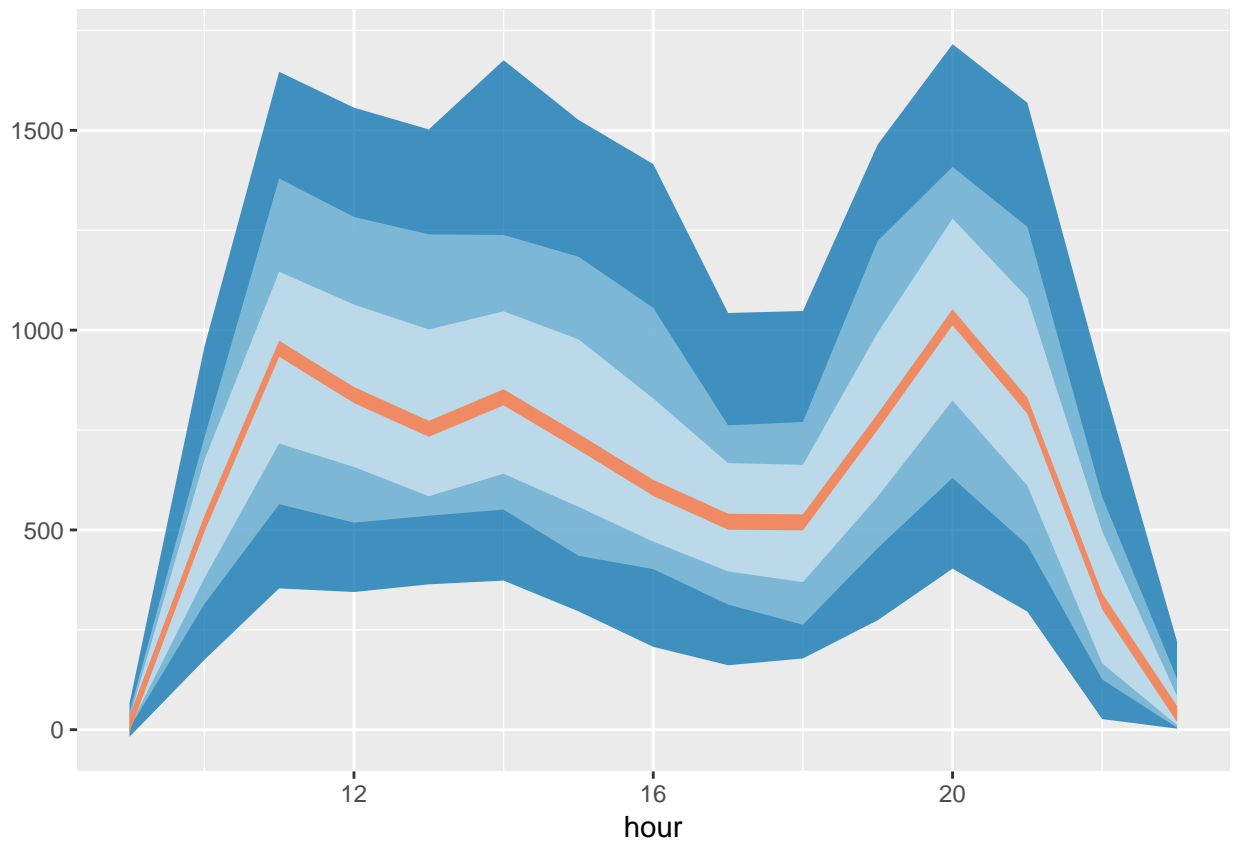
```

```

## 3      786.39
## 4     1055.71
## 5      460.39
## 6      449.06
## [1] "numeric"
## [1] "numeric"
## [1] 17
##   Total.Sales
## 1      599.12
## 2      654.13
## 3      350.98
## 4      805.29
## 5      447.99
## 6      393.94
## [1] "numeric"
## [1] "numeric"
## [1] 18
##   Total.Sales
## 1      199.25
## 2      658.82
## 3      669.26
## 4      237.73
## 5      350.73
## 6      657.92
## [1] "numeric"
## [1] "numeric"
## [1] 19
##   Total.Sales
## 1      474.10
## 2      757.40
## 3      406.12
## 4      613.29
## 5      273.92
## 6      889.56
## [1] "numeric"
## [1] "numeric"
## [1] 20
##   Total.Sales
## 1      576.27
## 2      759.47
## 3     1155.29
## 4     1436.20
## 5      860.33
## 6      833.23
## [1] "numeric"
## [1] "numeric"
## [1] 21
##   Total.Sales
## 1      361.64
## 2      216.47
## 3      822.34
## 4      651.27
## 5     1097.14
## 6      528.28

```

```
## [1] "numeric"
## [1] "numeric"
## [1] 22
##   Total.Sales
## 1      11.73
## 2     122.00
## 3     399.15
## 4     265.95
## 5     401.21
## 6     218.48
## [1] "numeric"
## [1] "numeric"
## [1] 23
##   Total.Sales
## 1      67.95
## 2     85.57
## 3       7.26
## 4     64.97
## 5       2.59
## 6     18.25
## [1] "numeric"
## [1] "numeric"
```



Prophet Trends

```
## Initial log joint probability = -127.145
## Optimization terminated normally:
##   Convergence detected: relative gradient magnitude is below tolerance
```