

# OKernel

## Visual Contrast Step

239 sessions from 9 animals

1112 (17), 1145 (23), 1150 (55), 1218 (28),  
1220 (24), 1257 (22), 866 (13), 902 (44),  
905 (13),

10 trial minimum for hits/misses

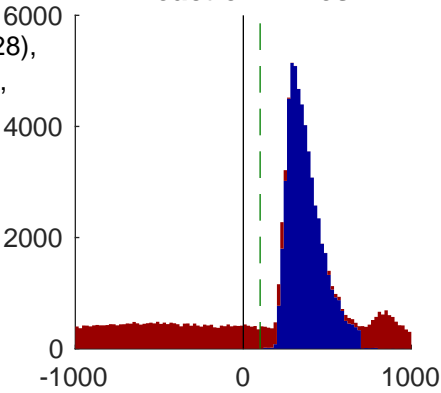
Delta d' >= -0.25

Avg(SD) d' noStim: 1.74 (0.54)

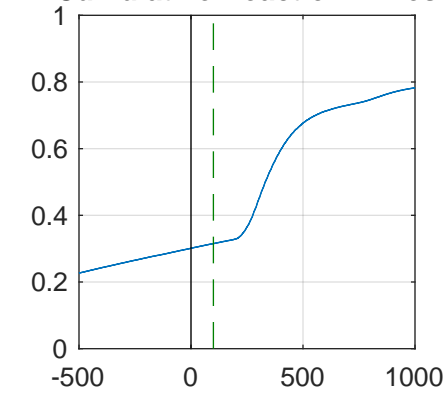
Avg(SD) d' stim: 1.45 (0.54)

Avg(SD) delta d': 0.29 (0.42)

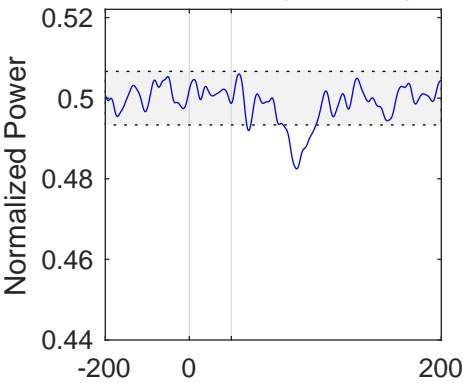
Reaction Times



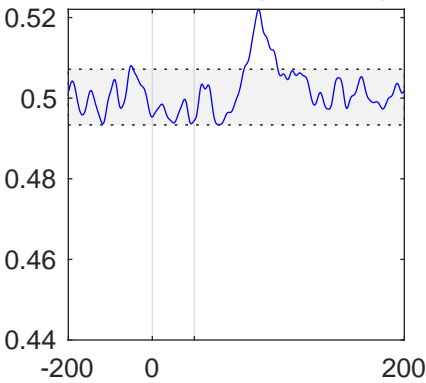
Cumulative Reaction Times



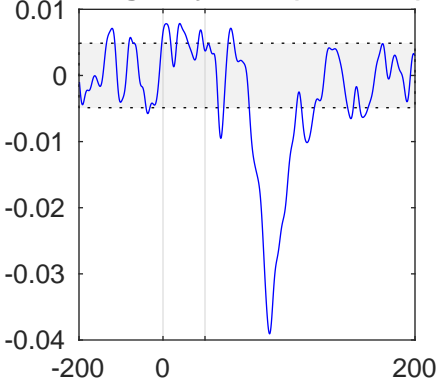
Hit Kernel (n=21769)



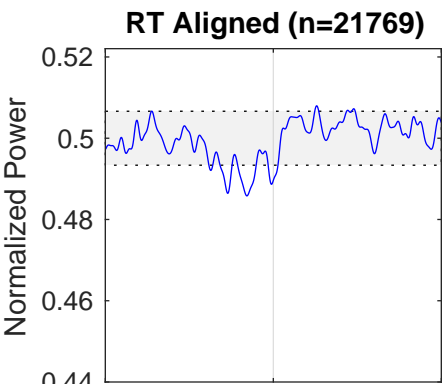
Miss Kernel (n=18589)



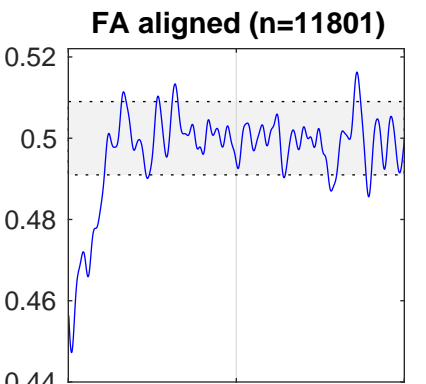
Weight by Trial (n=40358)



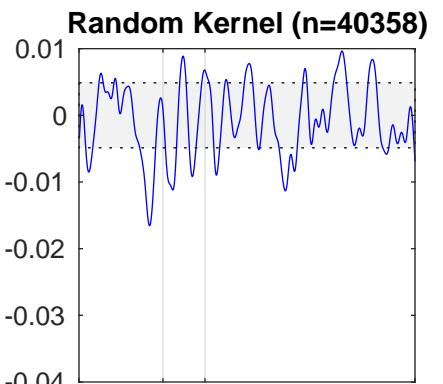
RT Aligned (n=21769)



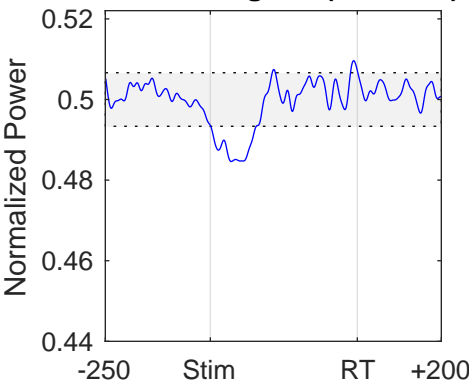
FA aligned (n=11801)



Random Kernel (n=40358)



Stim-RT Aligned (n=21769)



# OKernel

## Visual Contrast Step

231 sessions from 9 animals

1112 (17), 1145 (21), 1150 (54), 1218 (28),  
1220 (23), 1257 (18), 866 (13), 902 (44),  
905 (13),

10 trial minimum for hits/misses

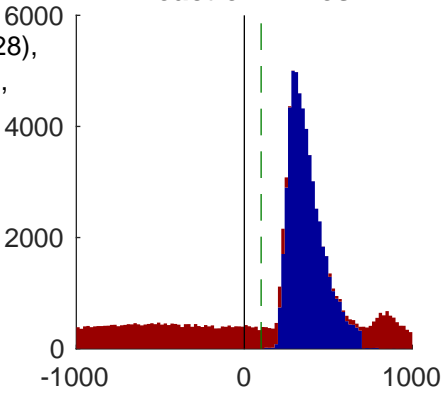
Delta d' >=-0.20

Avg(SD) d' noStim: 1.75 (0.54)

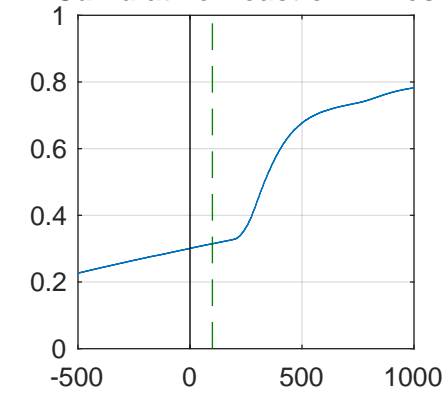
Avg(SD) d' stim: 1.44 (0.55)

Avg(SD) delta d': 0.31 (0.42)

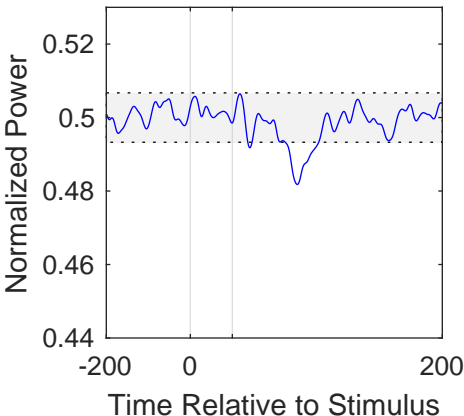
Reaction Times



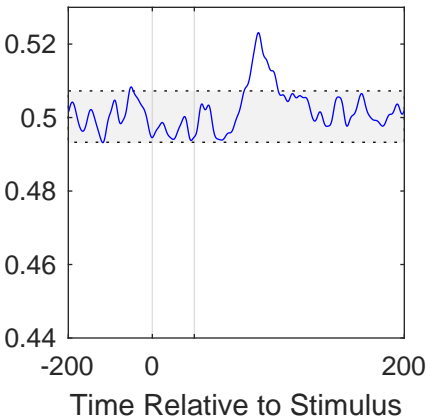
Cumulative Reaction Times



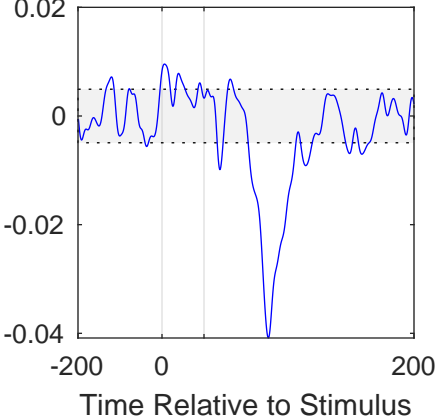
Hit Kernel (n=21260)



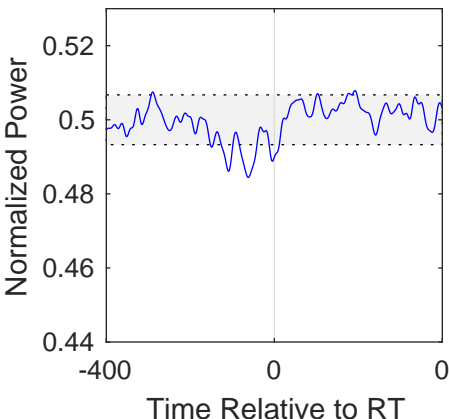
Miss Kernel (n=18265)



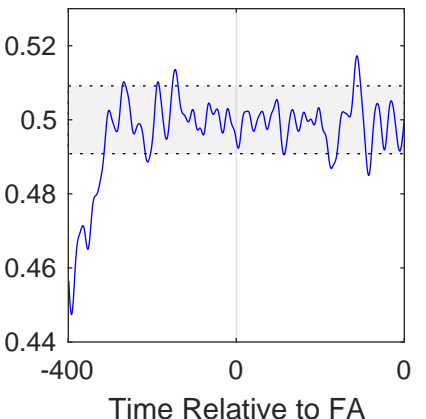
Weight by Trial (n=39525)



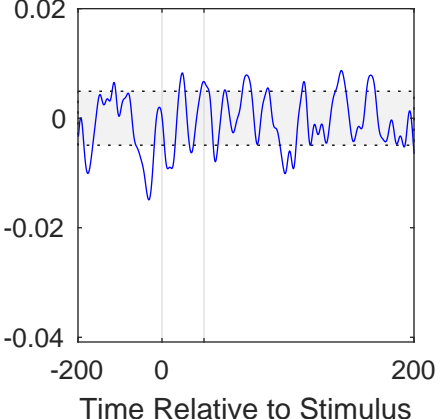
RT Aligned (n=21260)



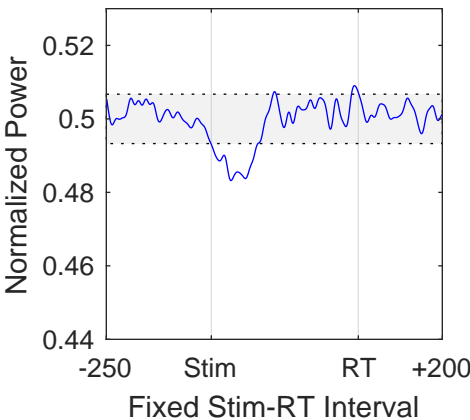
FA aligned (n=11470)



Random Kernel (n=39525)



Stim-RT Aligned (n=21260)



# OKernel

## Visual Contrast Step

224 sessions from 9 animals

1112 (17), 1145 (21), 1150 (54), 1218 (27),  
1220 (19), 1257 (16), 866 (13), 902 (44),  
905 (13),

10 trial minimum for hits/misses

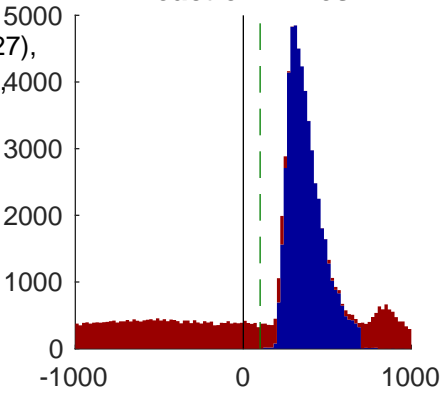
Delta d' >=-0.15

Avg(SD) d' noStim: 1.75 (0.54)

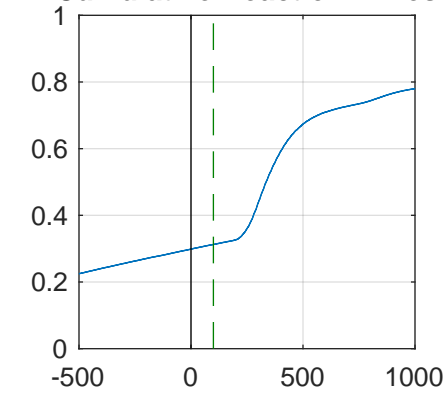
Avg(SD) d' stim: 1.42 (0.54)

Avg(SD) delta d': 0.33 (0.42)

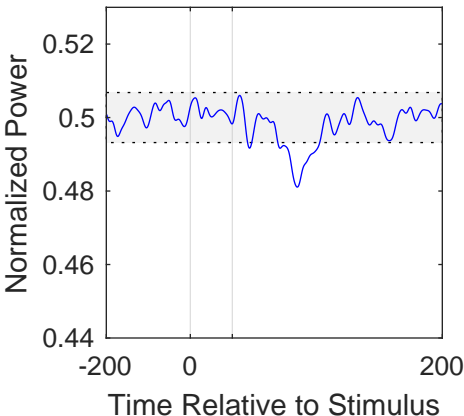
Reaction Times



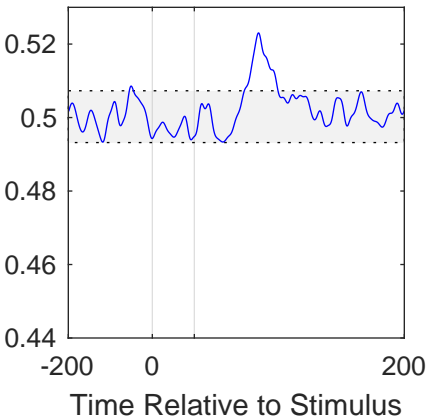
Cumulative Reaction Times



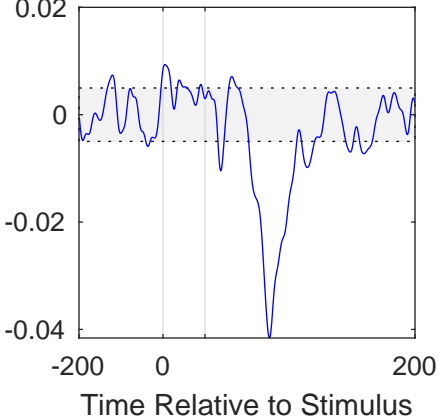
Hit Kernel (n=20716)



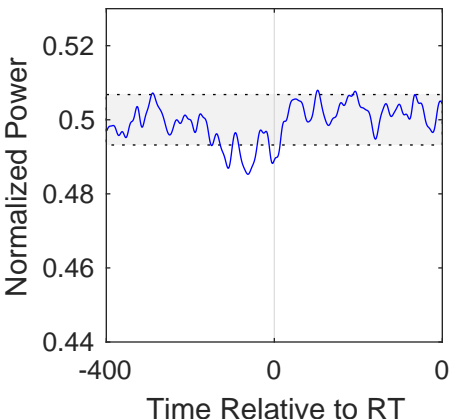
Miss Kernel (n=18068)



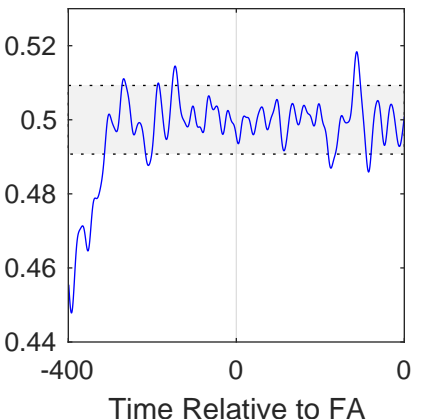
Weight by Trial (n=38784)



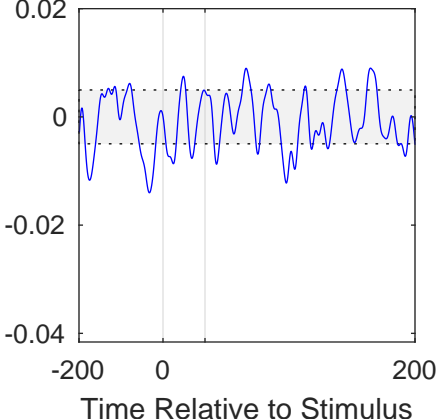
RT Aligned (n=20716)



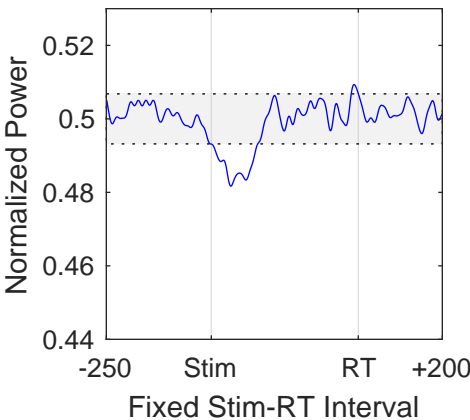
FA aligned (n=11185)



Random Kernel (n=38784)



Stim-RT Aligned (n=20716)



# OKernel

## Visual Contrast Step

212 sessions from 9 animals

1112 (16), 1145 (19), 1150 (52), 1218 (25),  
1220 (17), 1257 (13), 866 (13), 902 (44),  
905 (13),

10 trial minimum for hits/misses

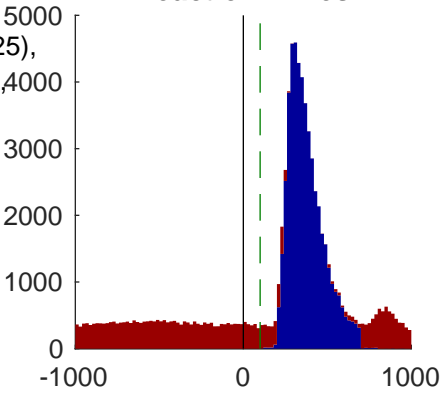
Delta d' >= -0.10

Avg(SD) d' noStim: 1.75 (0.54)

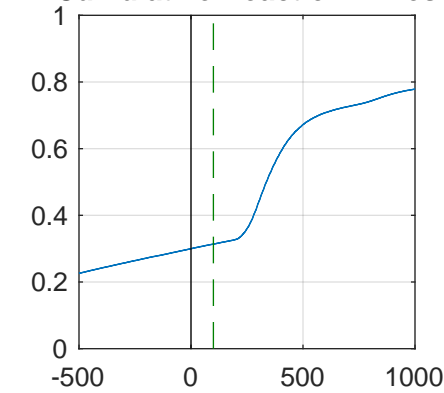
Avg(SD) d' stim: 1.40 (0.53)

Avg(SD) delta d': 0.35 (0.41)

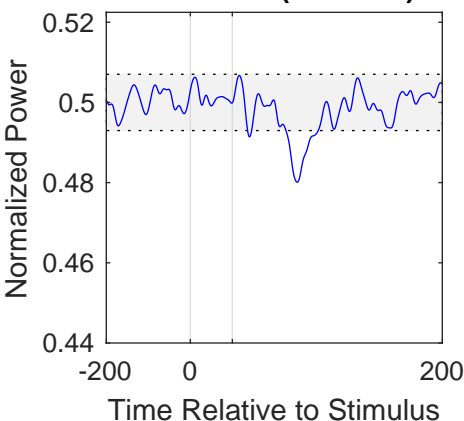
Reaction Times



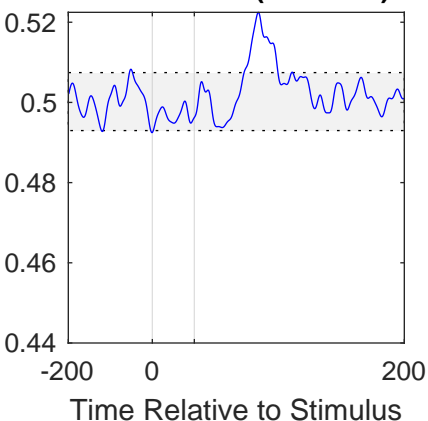
Cumulative Reaction Times



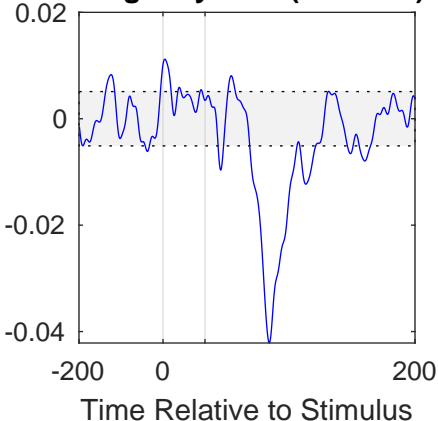
Hit Kernel (n=19474)



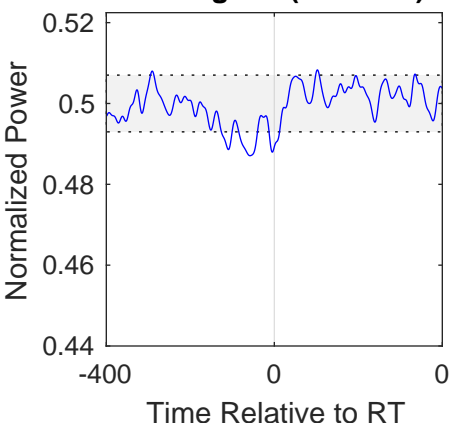
Miss Kernel (n=17364)



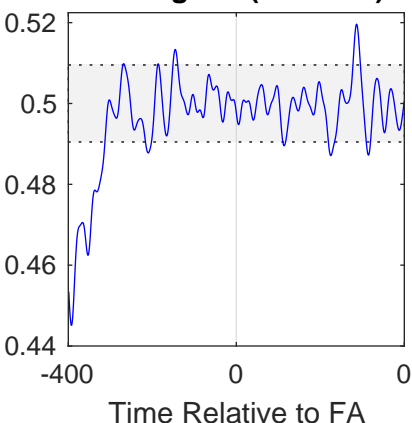
Weight by Trial (n=36838)



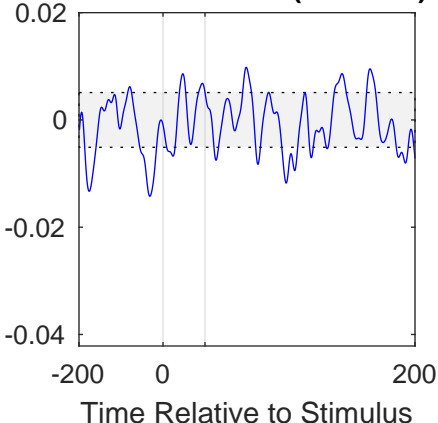
RT Aligned (n=19474)



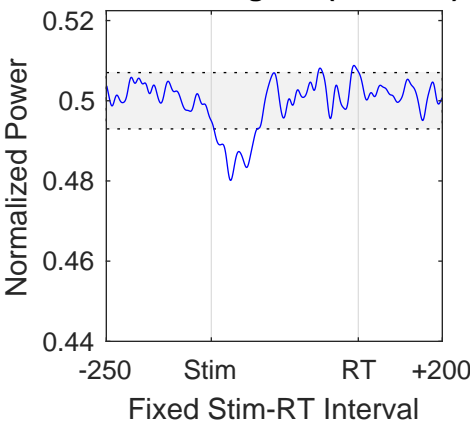
FA aligned (n=10579)



Random Kernel (n=36838)



Stim-RT Aligned (n=19474)



# OKernel

## Visual Contrast Step

202 sessions from 9 animals

1112 (14), 1145 (19), 1150 (51), 1218 (22),  
1220 (17), 1257 (11), 866 (11), 902 (44),  
905 (13),

10 trial minimum for hits/misses

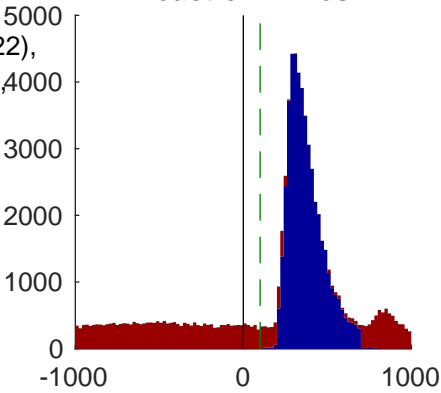
Delta d' >=-0.05

Avg(SD) d' noStim: 1.77 (0.55)

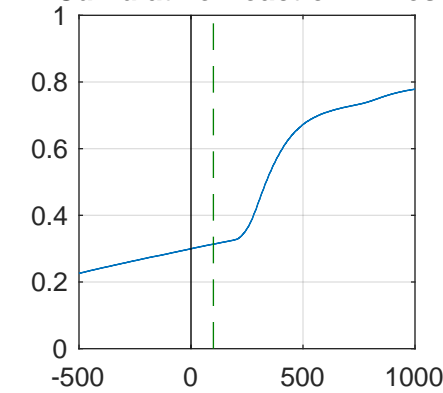
Avg(SD) d' stim: 1.40 (0.54)

Avg(SD) delta d': 0.37 (0.41)

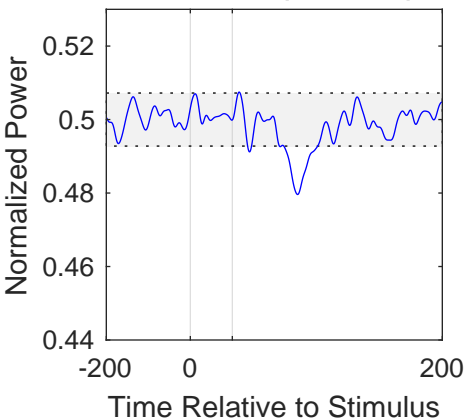
Reaction Times



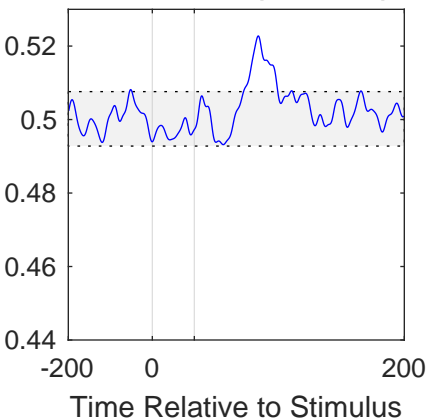
Cumulative Reaction Times



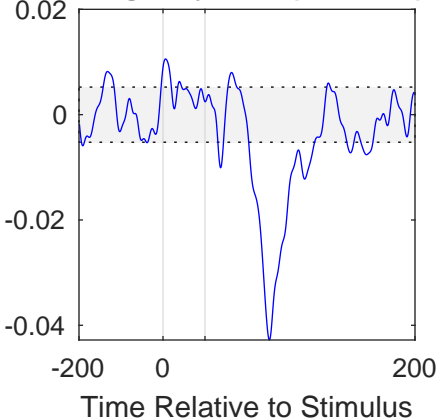
Hit Kernel (n=18430)



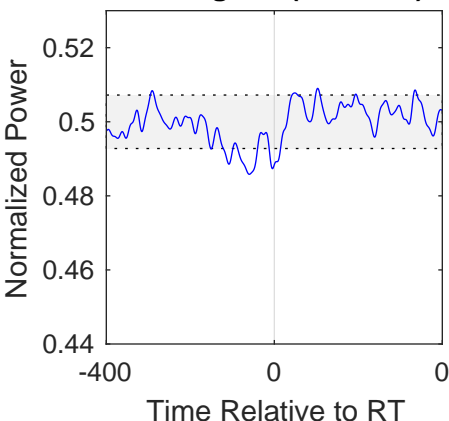
Miss Kernel (n=16617)



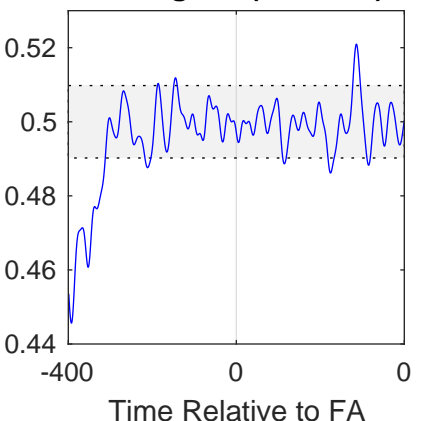
Weight by Trial (n=35047)



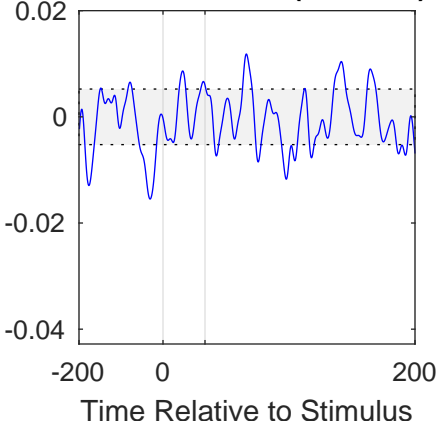
RT Aligned (n=18430)



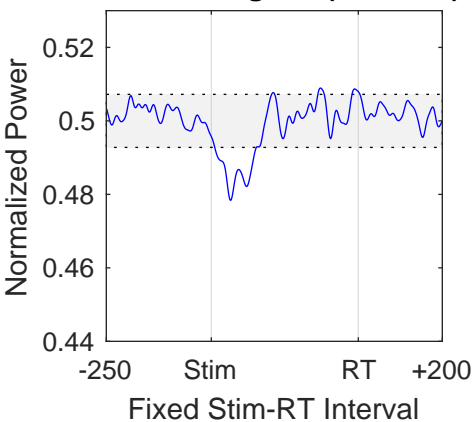
FA aligned (n=10042)



Random Kernel (n=35047)



Stim-RT Aligned (n=18430)



# OKernel

## Visual Contrast Step

177 sessions from 8 animals

1112 (13), 1145 (17), 1150 (48), 1218 (17),

1220 (16), 1257 (10), 902 (43), 905 (13)

10 trial minimum for hits/misses

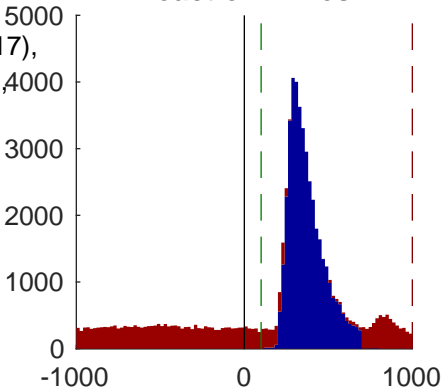
Delta d' >=0.00

Avg(SD) d' noStim: 1.78 (0.56)

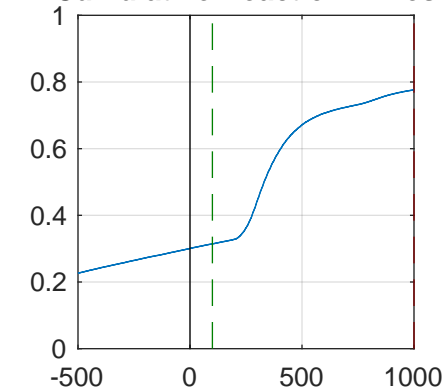
Avg(SD) d' stim: 1.37 (0.55)

Avg(SD) delta d': 0.41 (0.42)

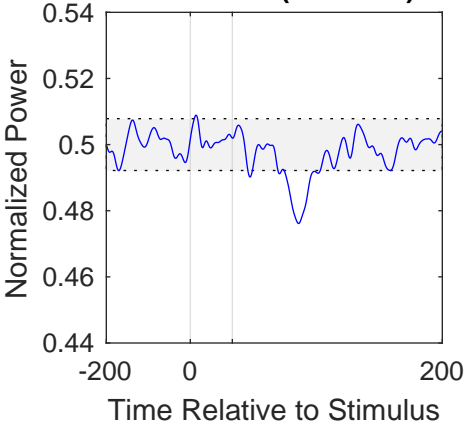
Reaction Times



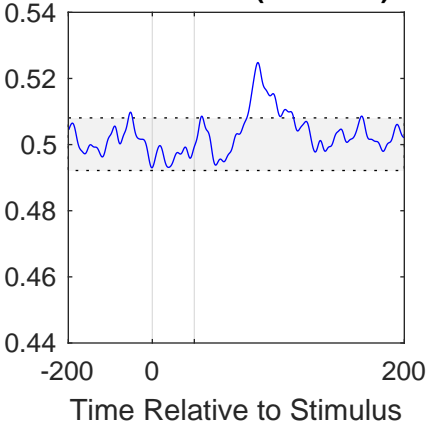
Cumulative Reaction Times



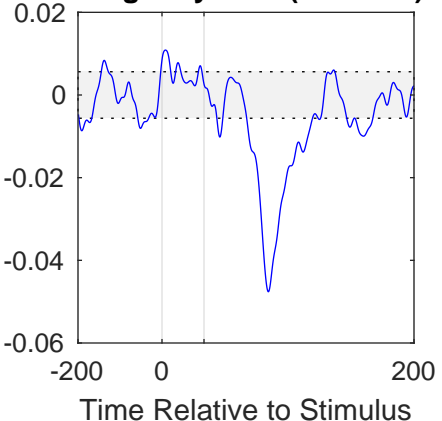
Hit Kernel (n=15639)



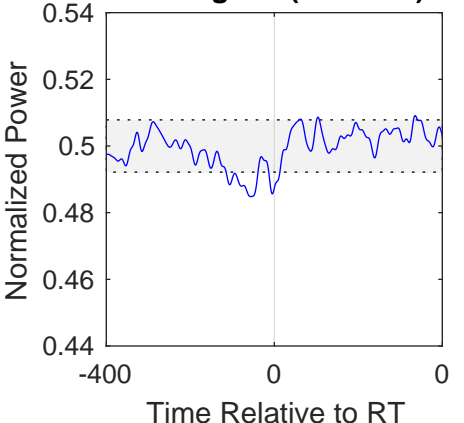
Miss Kernel (n=14729)



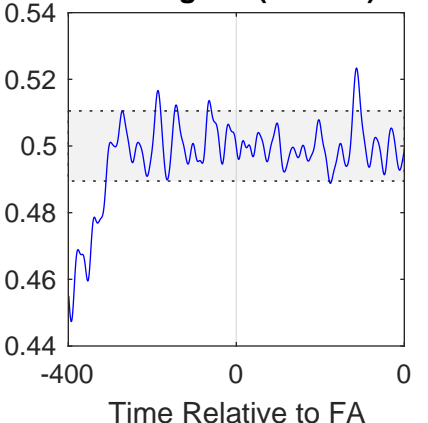
Weight by Trial (n=30368)



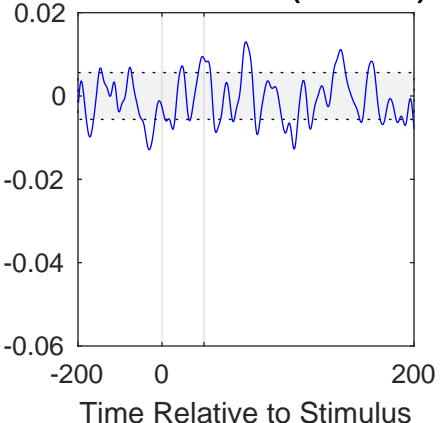
RT Aligned (n=15639)



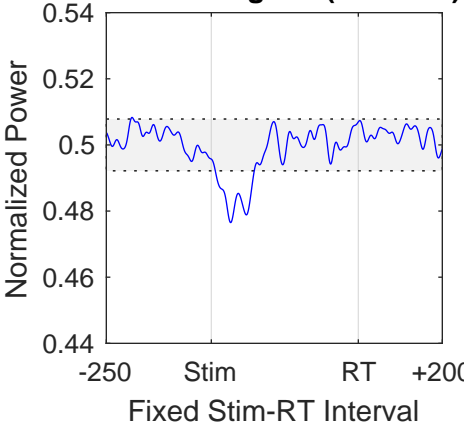
FA aligned (n=8676)



Random Kernel (n=30368)



Stim-RT Aligned (n=15639)



# OKernel

## Visual Contrast Step

149 sessions from 7 animals

1112 (12), 1145 (15), 1150 (44), 1218 (12),

1220 (10), 902 (43), 905 (13),

10 trial minimum for hits/misses

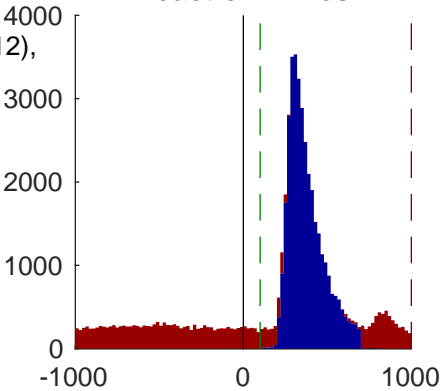
Delta d'  $\geq 0.05$

Avg(SD) d' noStim: 1.79 (0.57)

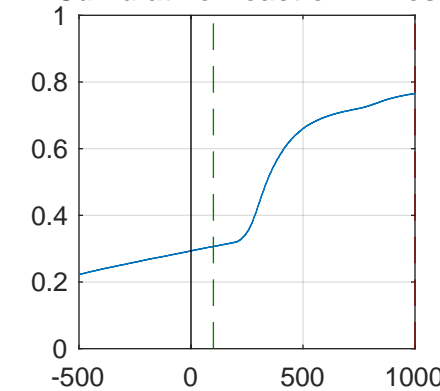
Avg(SD) d' stim: 1.32 (0.55)

Avg(SD) delta d': 0.48 (0.43)

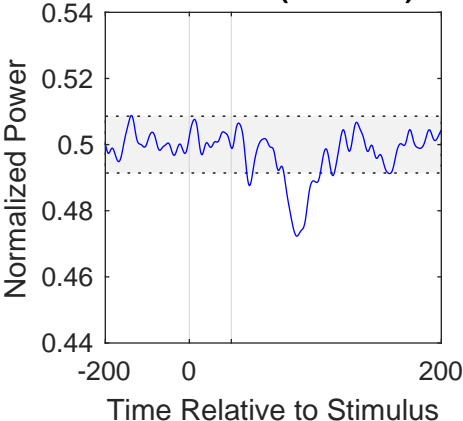
Reaction Times



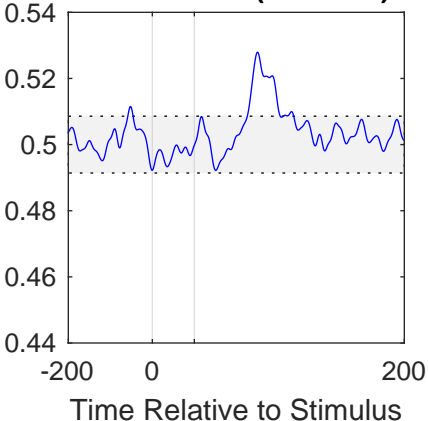
Cumulative Reaction Times



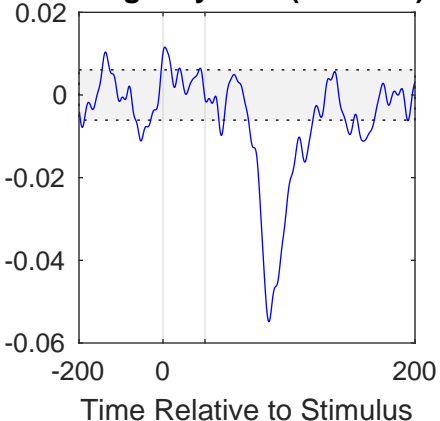
Hit Kernel (n=13004)



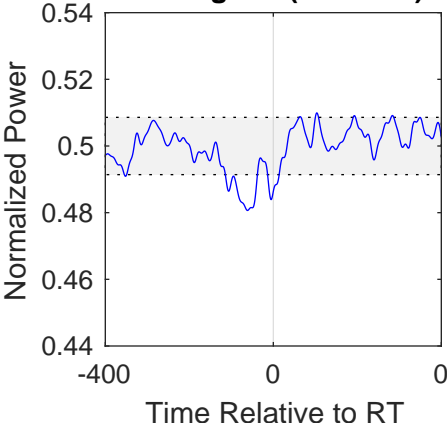
Miss Kernel (n=12995)



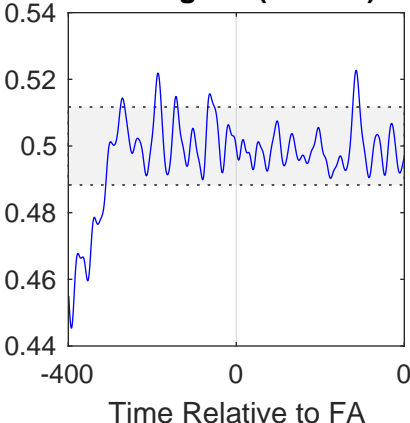
Weight by Trial (n=25999)



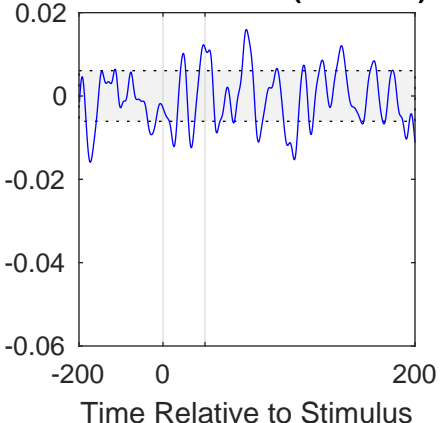
RT Aligned (n=13004)



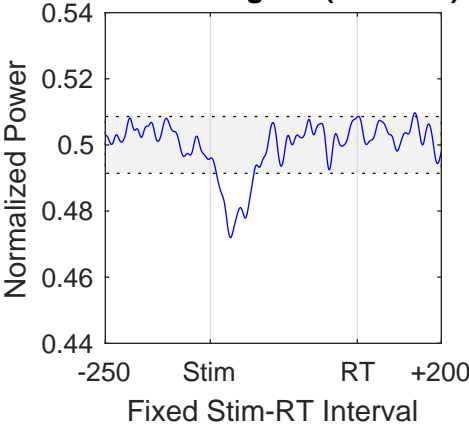
FA aligned (n=7019)



Random Kernel (n=25999)



Stim-RT Aligned (n=13004)



# OKernel

## Visual Contrast Step

115 sessions from 5 animals

1112 (12), 1145 (13), 1150 (35), 902 (43),  
905 (12),

10 trial minimum for hits/misses

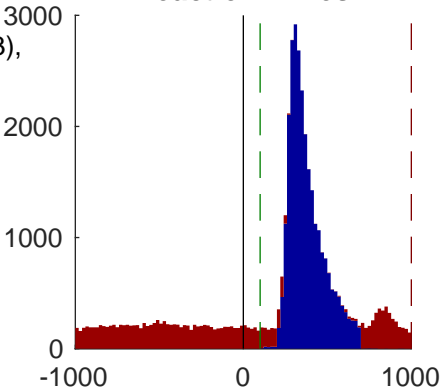
Delta d'  $\geq 0.10$

Avg(SD) d' noStim: 1.78 (0.59)

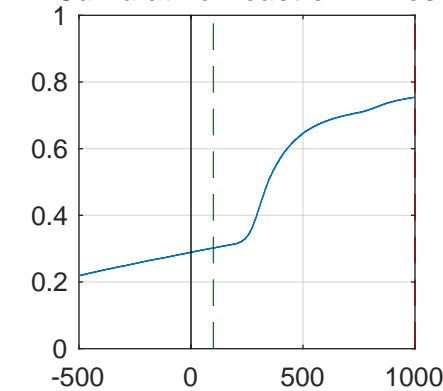
Avg(SD) d' stim: 1.20 (0.51)

Avg(SD) delta d': 0.58 (0.44)

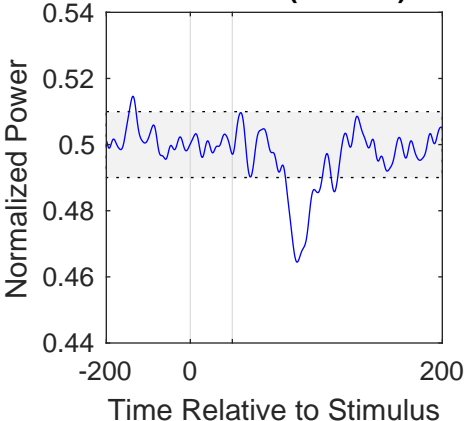
Reaction Times



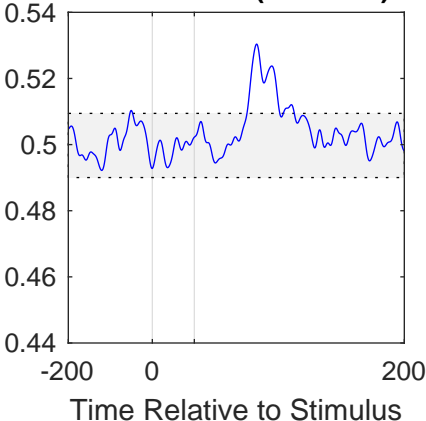
Cumulative Reaction Times



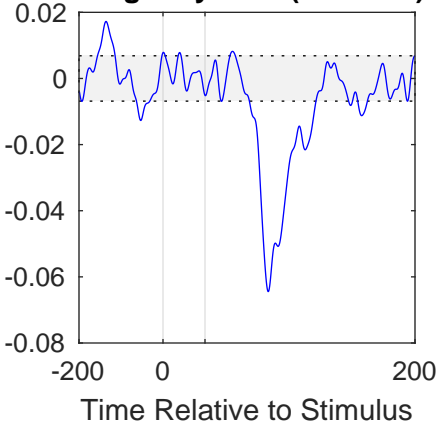
Hit Kernel (n=9662)



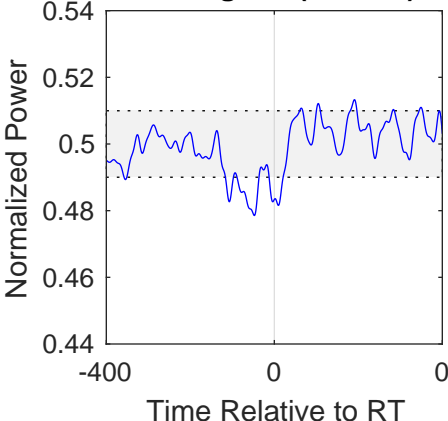
Miss Kernel (n=10777)



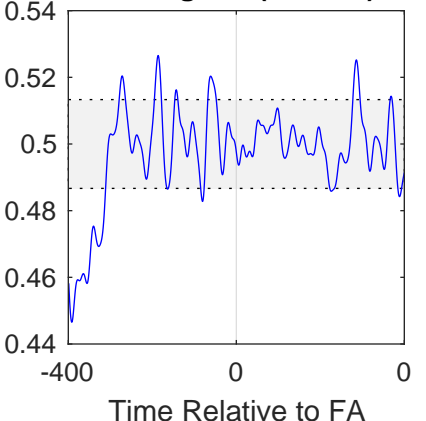
Weight by Trial (n=20439)



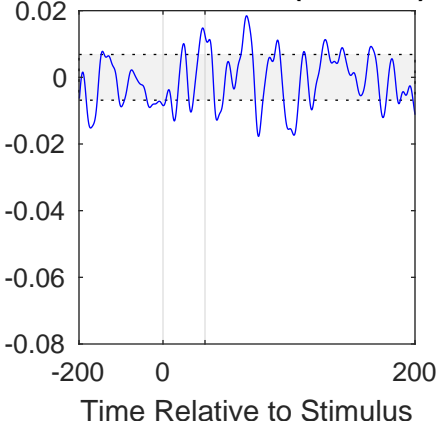
RT Aligned (n=9662)



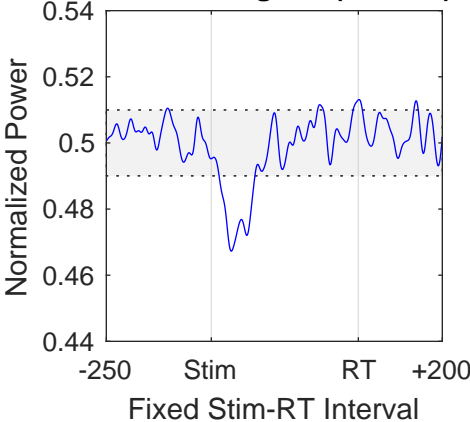
FA aligned (n=5414)



Random Kernel (n=20439)



Stim-RT Aligned (n=9662)





# OKernel

## Visual Contrast Step

94 sessions from 4 animals

1112 (12), 1145 (11), 1150 (28), 902 (43),

10 trial minimum for hits/misses

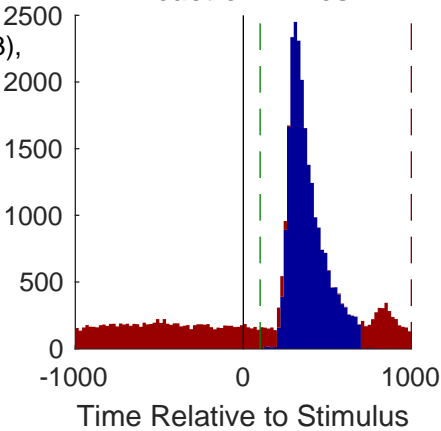
Delta d'  $\geq 0.15$

Avg(SD) d' noStim: 1.82 (0.59)

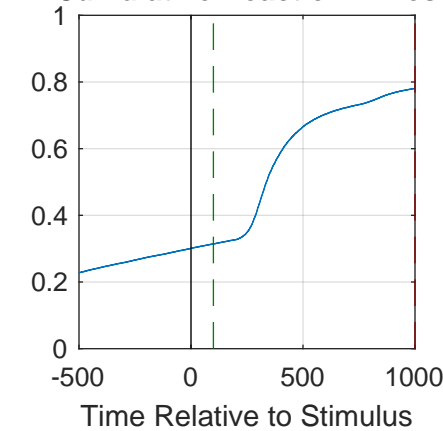
Avg(SD) d' stim: 1.19 (0.49)

Avg(SD) delta d': 0.63 (0.44)

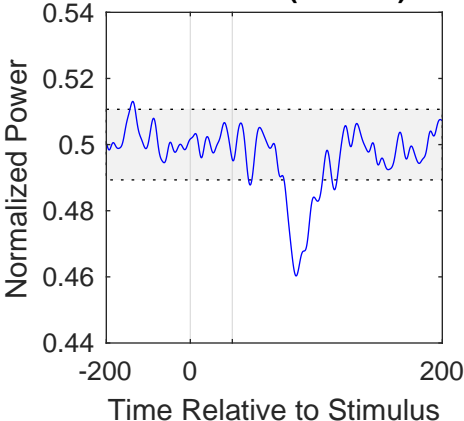
Reaction Times



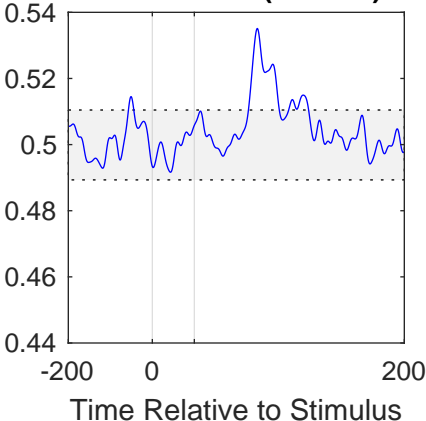
Cumulative Reaction Times



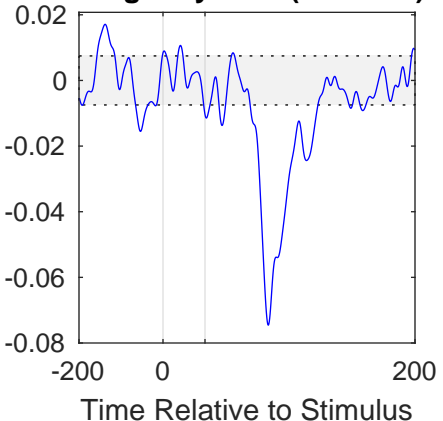
Hit Kernel (n=8429)



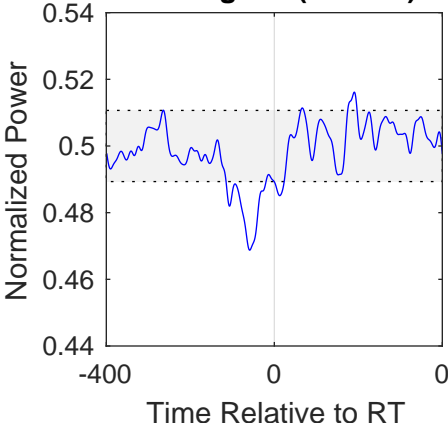
Miss Kernel (n=8778)



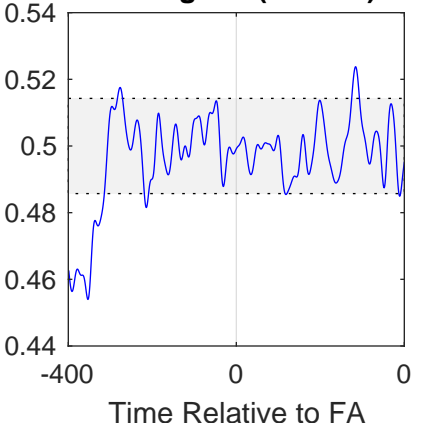
Weight by Trial (n=17207)



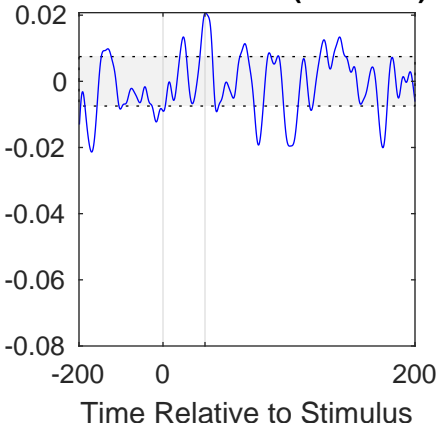
RT Aligned (n=8429)



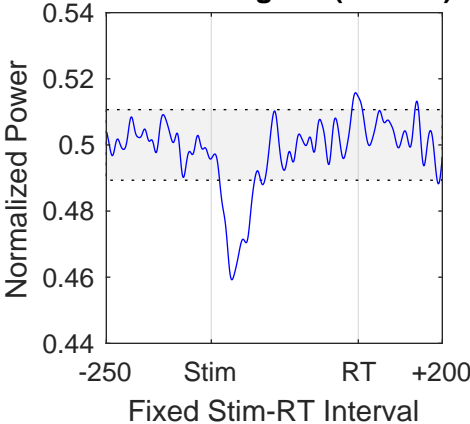
FA aligned (n=4709)



Random Kernel (n=17207)



Stim-RT Aligned (n=8429)



# OKernel

## Visual Contrast Step

87 sessions from 4 animals

1112 (11), 1145 (11), 1150 (23), 902 (42),

10 trial minimum for hits/misses

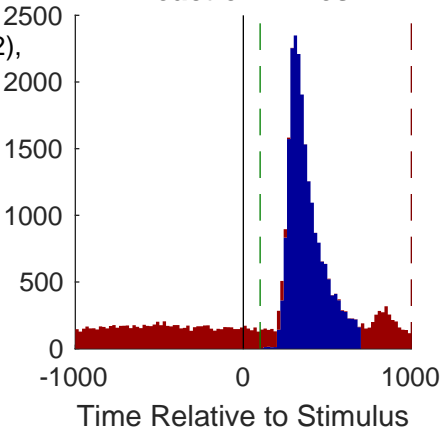
Delta d'  $\geq 0.20$

Avg(SD) d' noStim: 1.85 (0.60)

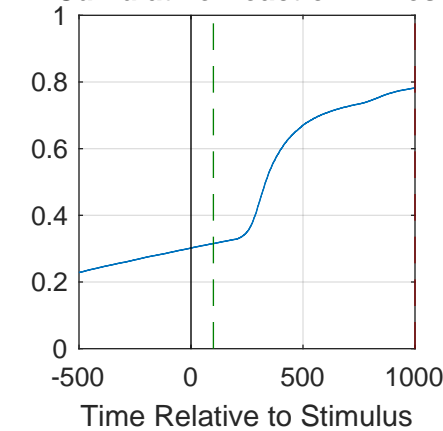
Avg(SD) d' stim: 1.18 (0.49)

Avg(SD) delta d': 0.66 (0.44)

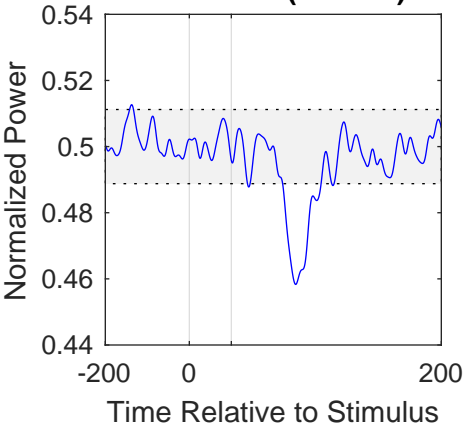
Reaction Times



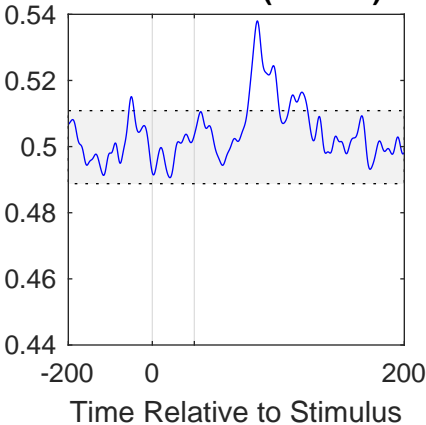
Cumulative Reaction Times



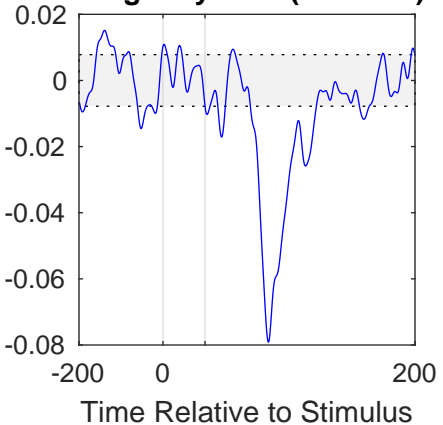
Hit Kernel (n=7633)



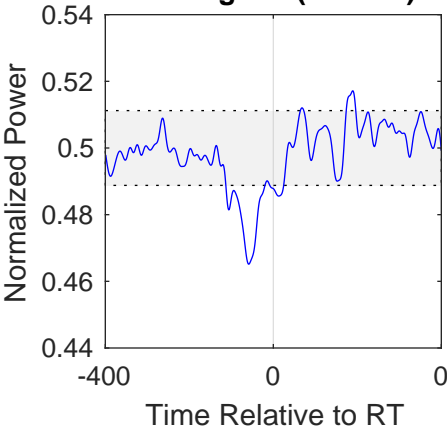
Miss Kernel (n=8129)



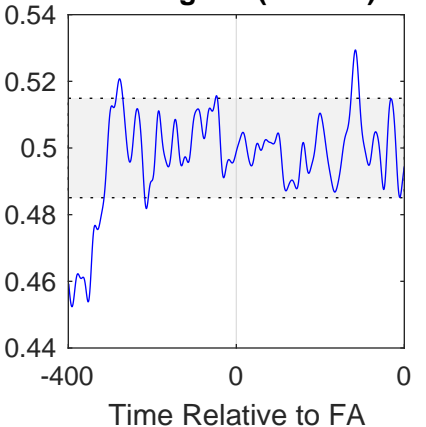
Weight by Trial (n=15762)



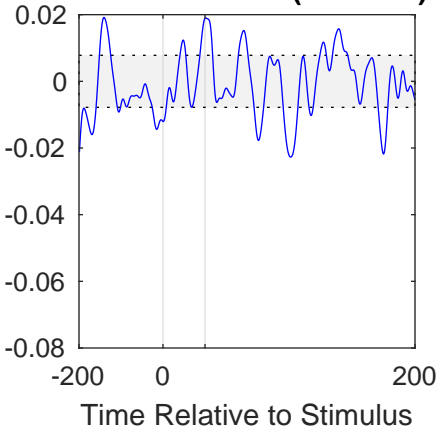
RT Aligned (n=7633)



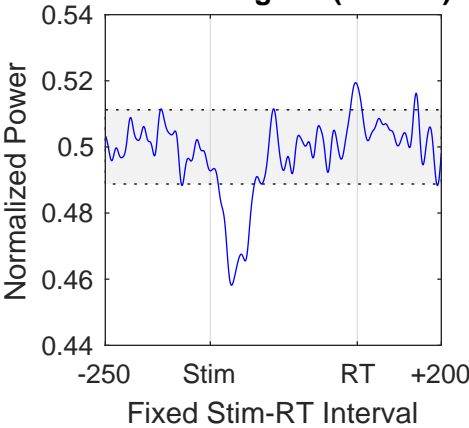
FA aligned (n=4314)



Random Kernel (n=15762)



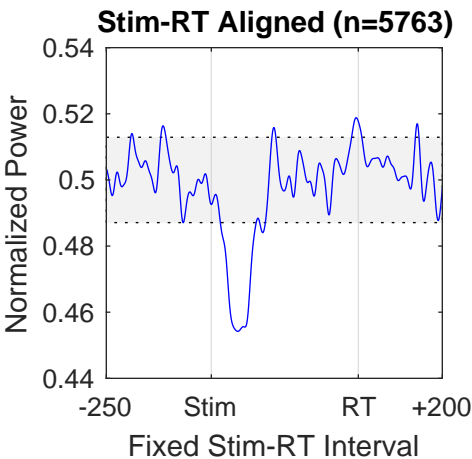
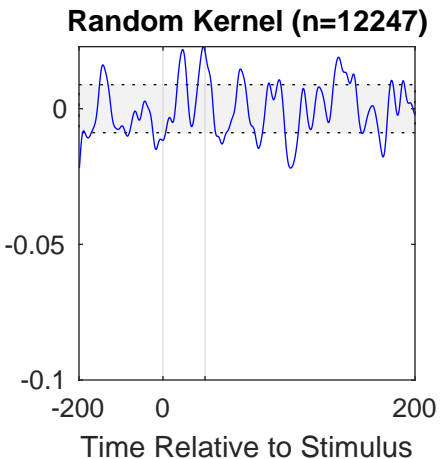
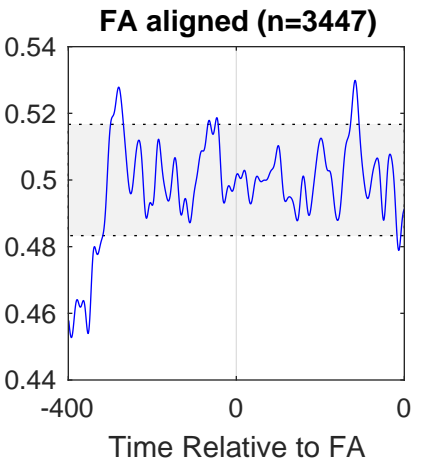
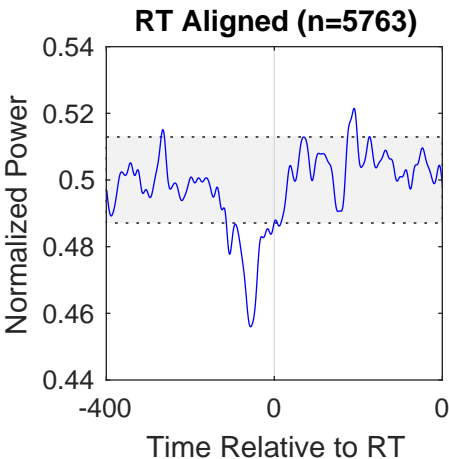
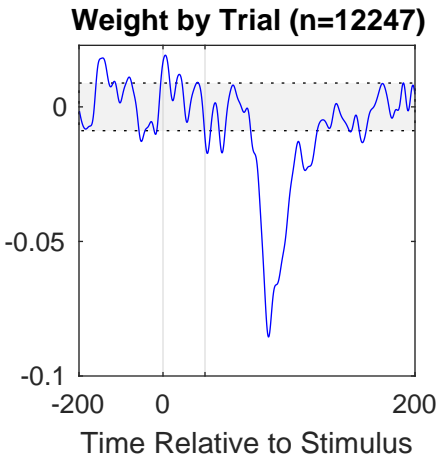
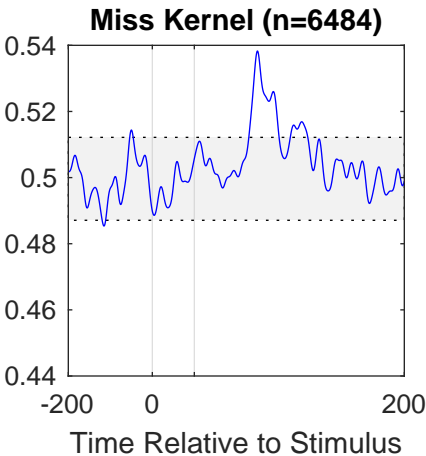
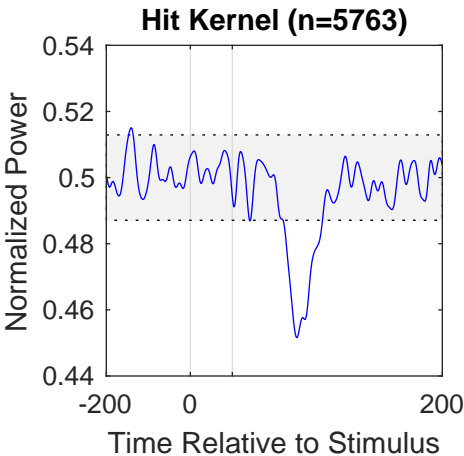
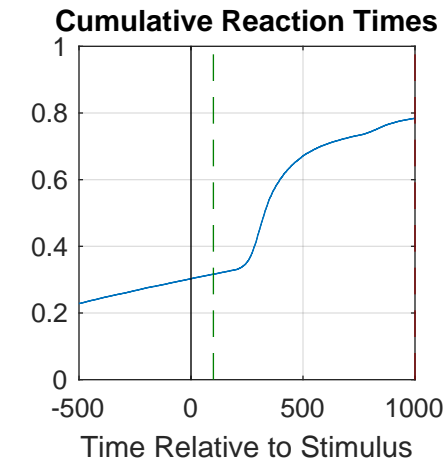
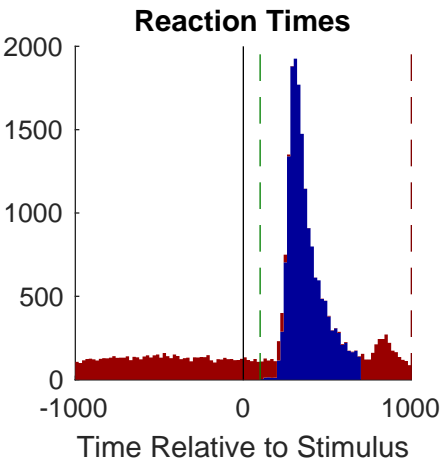
Stim-RT Aligned (n=7633)



# OKernel

## Visual Contrast Step

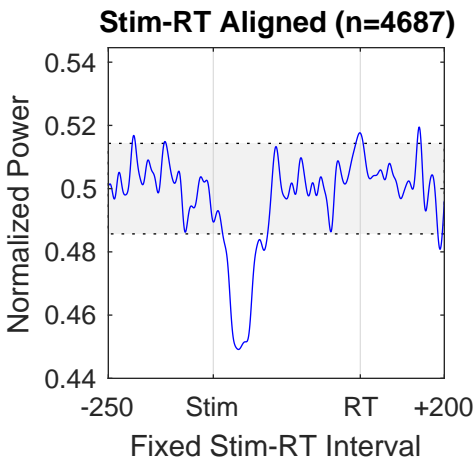
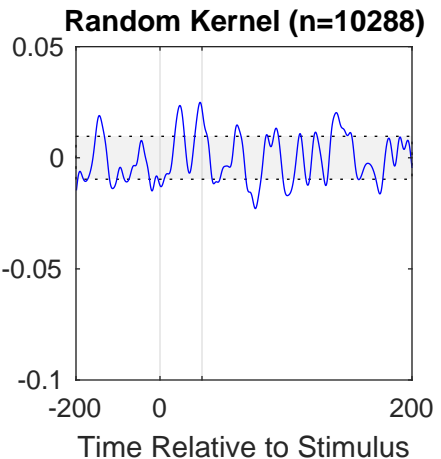
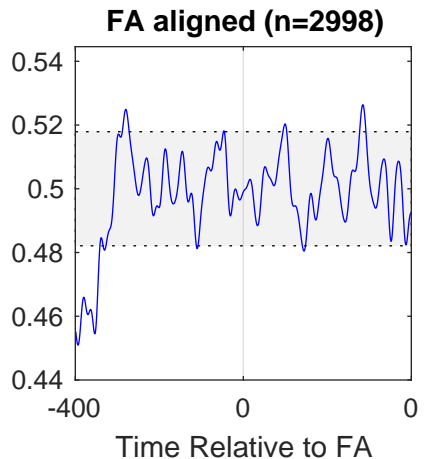
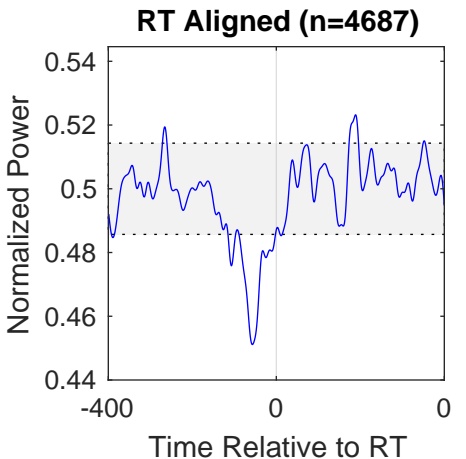
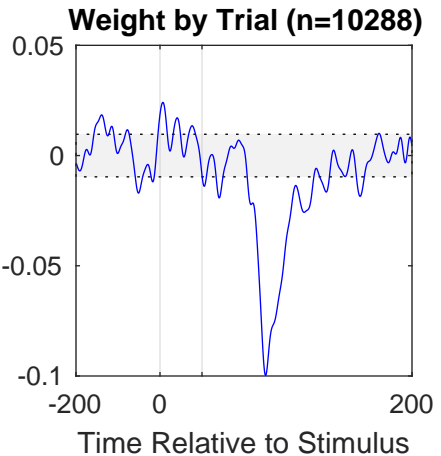
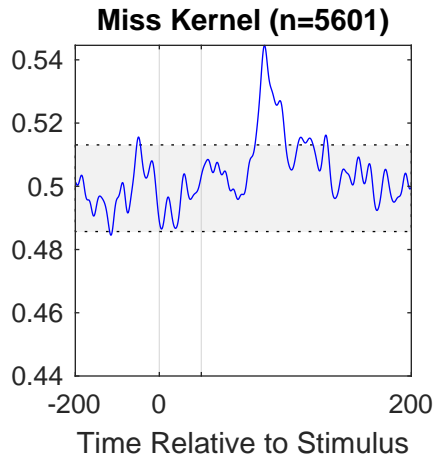
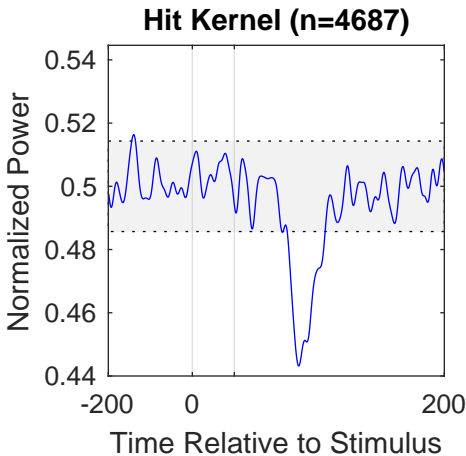
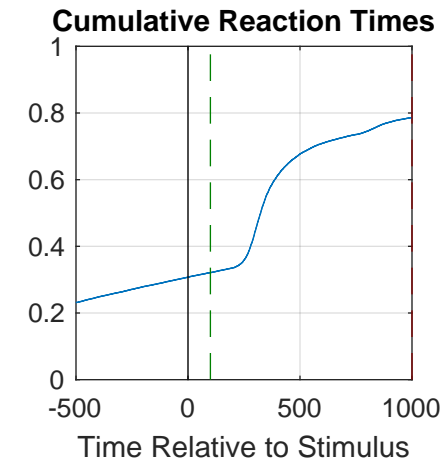
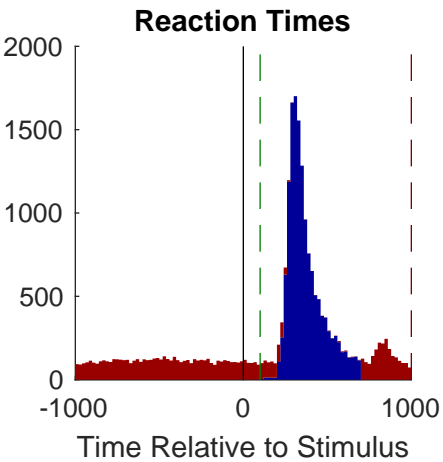
70 sessions from 3 animals  
1112 (11), 1150 (17), 902 (42),  
10 trial minimum for hits/misses  
Delta d'  $\geq 0.25$   
Avg(SD) d' noStim: 1.87 (0.65)  
Avg(SD) d' stim: 1.13 (0.52)  
Avg(SD) delta d': 0.73 (0.45)



# OKernel

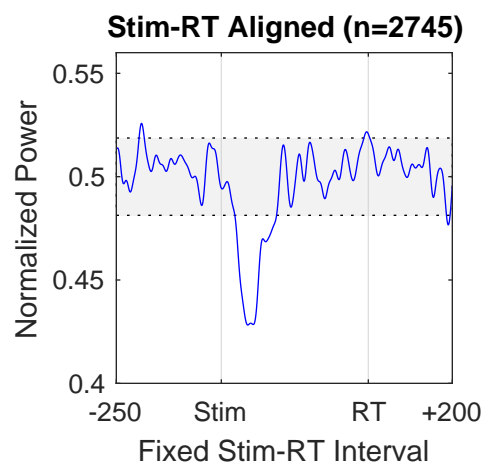
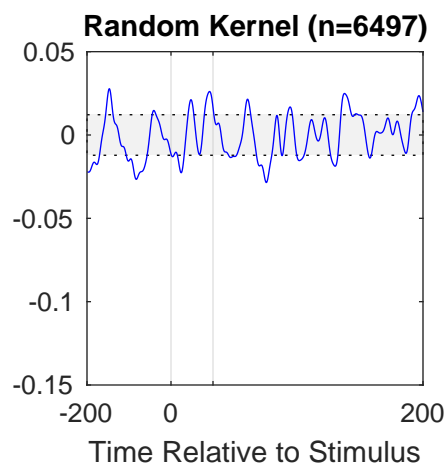
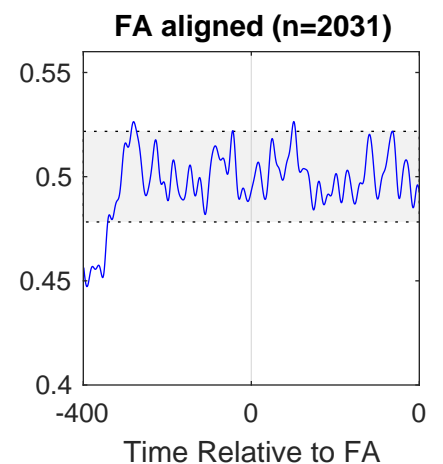
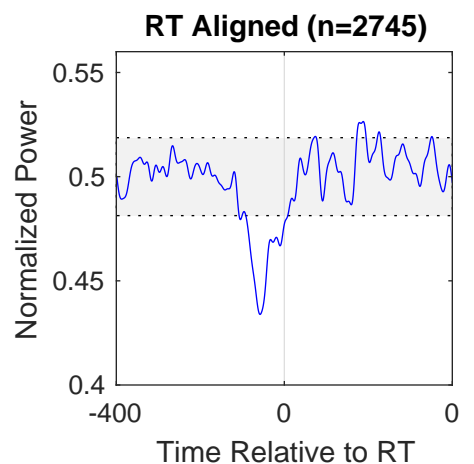
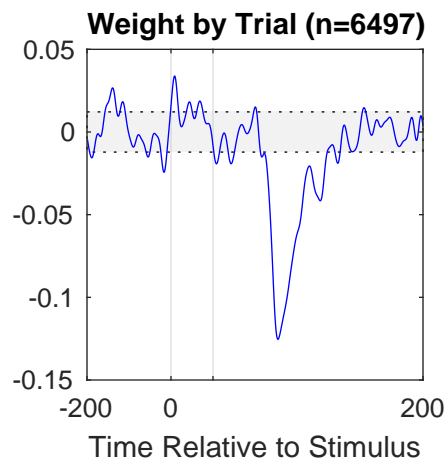
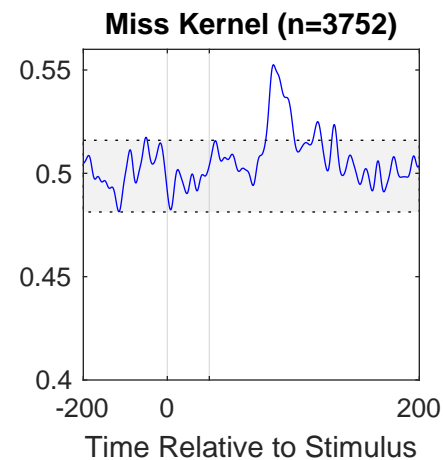
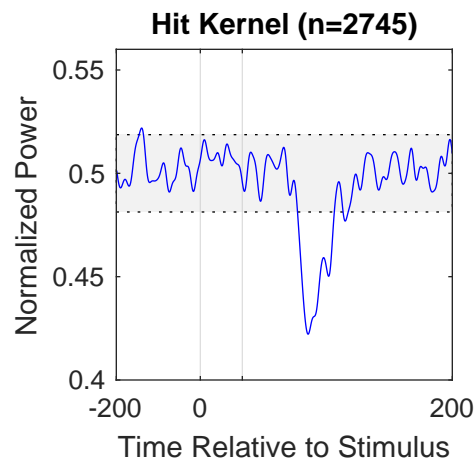
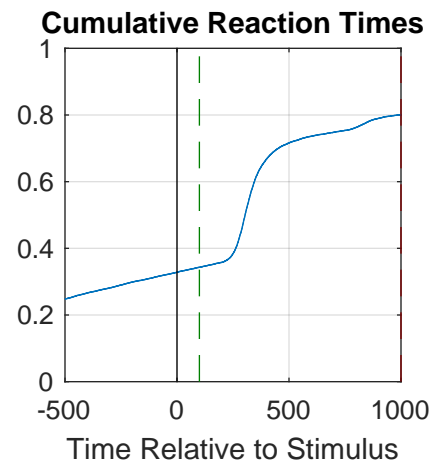
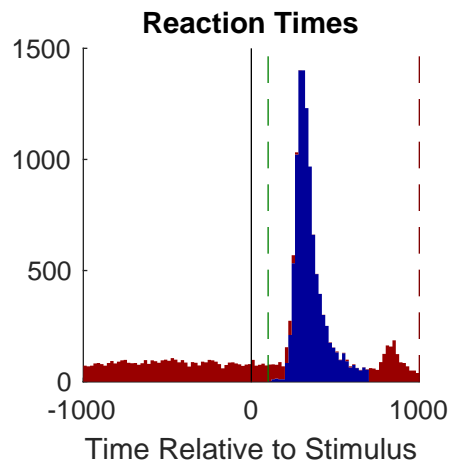
## Visual Contrast Step

60 sessions from 3 animals  
1112 (10), 1150 (10), 902 (40),  
10 trial minimum for hits/misses  
Delta d'  $\geq 0.30$   
Avg(SD) d' noStim: 1.90 (0.69)  
Avg(SD) d' stim: 1.09 (0.54)  
Avg(SD) delta d': 0.81 (0.44)



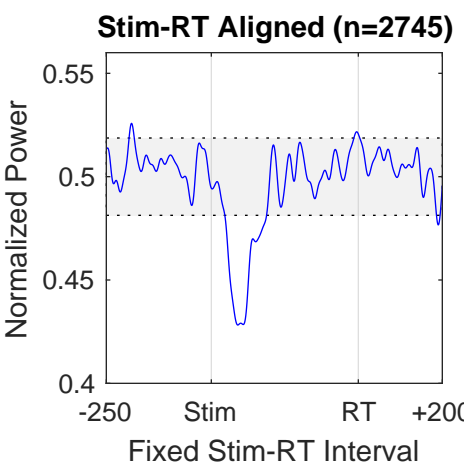
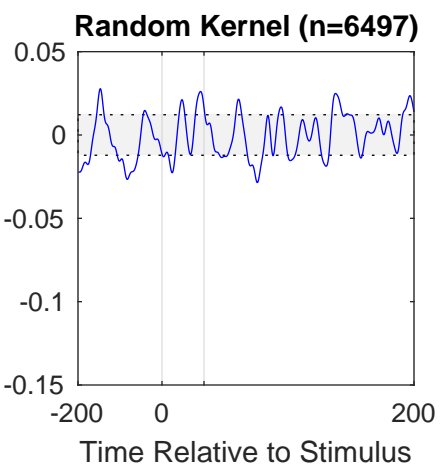
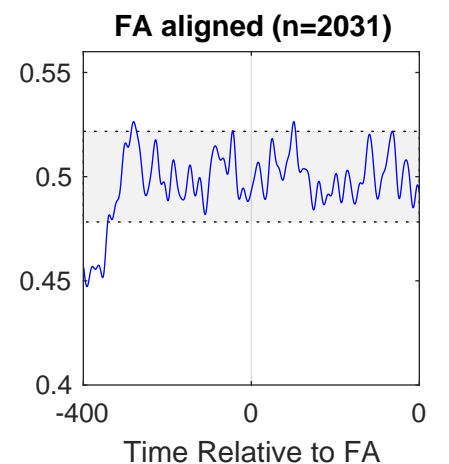
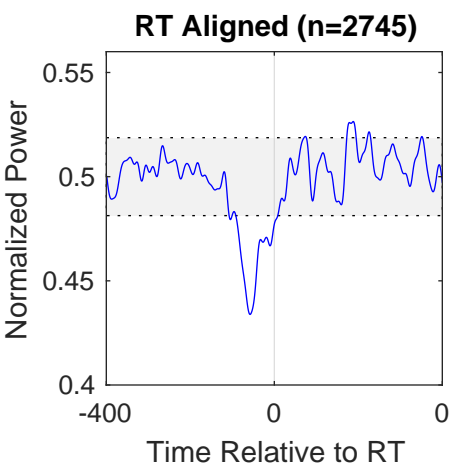
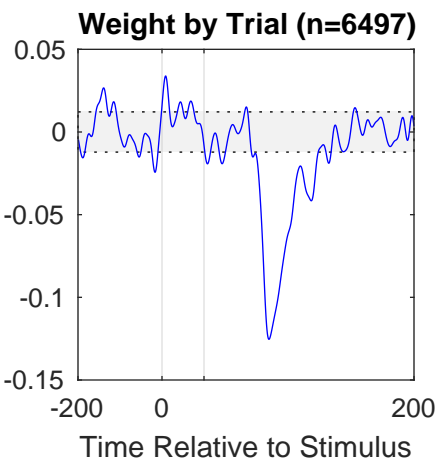
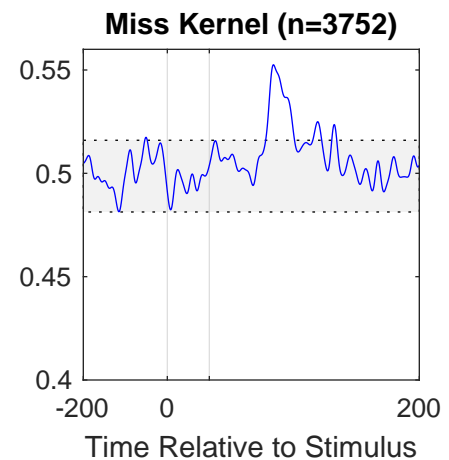
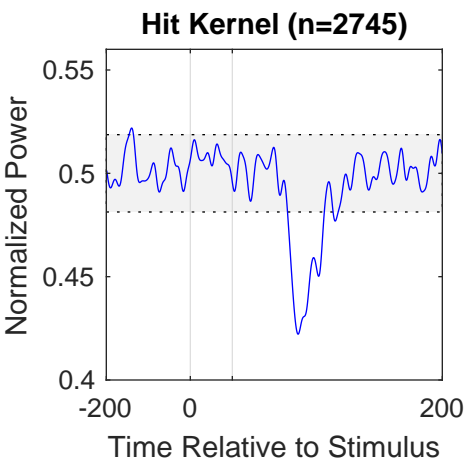
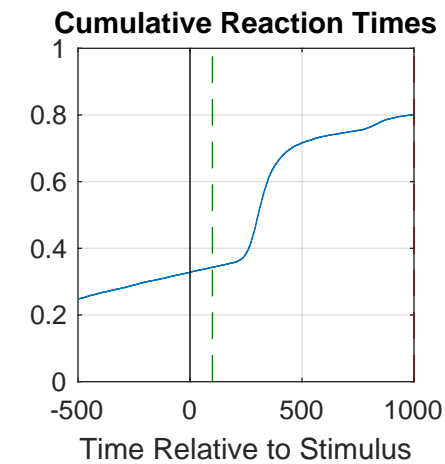
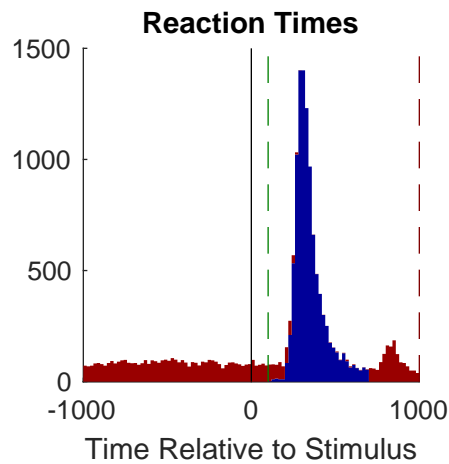
# OKernel

Visual Contrast Step  
40 sessions from 1 animals  
902 (40),  
10 trial minimum for hits/misses  
Delta d' >=0.35  
Avg(SD) d' noStim: 2.09 (0.70)  
Avg(SD) d' stim: 1.10 (0.53)  
Avg(SD) delta d': 0.99 (0.43)



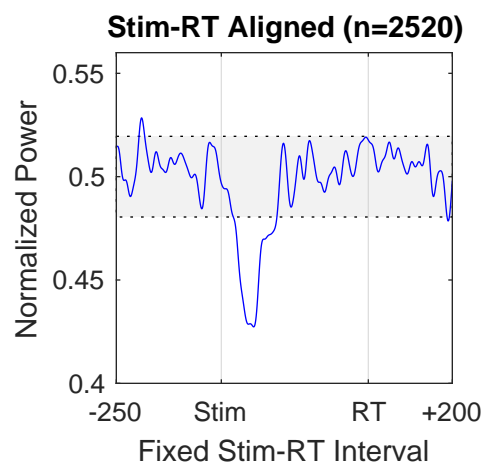
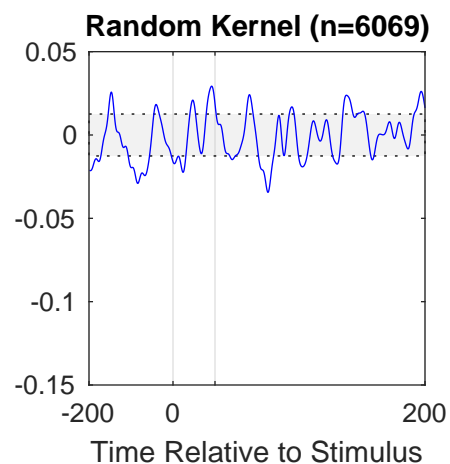
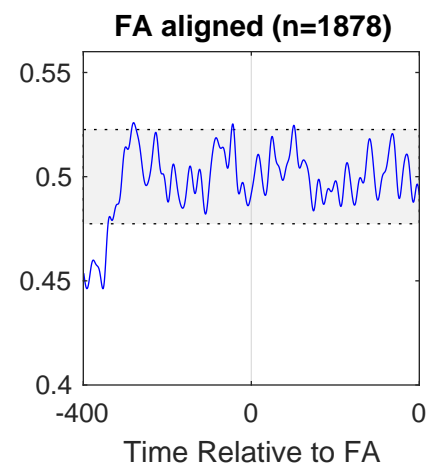
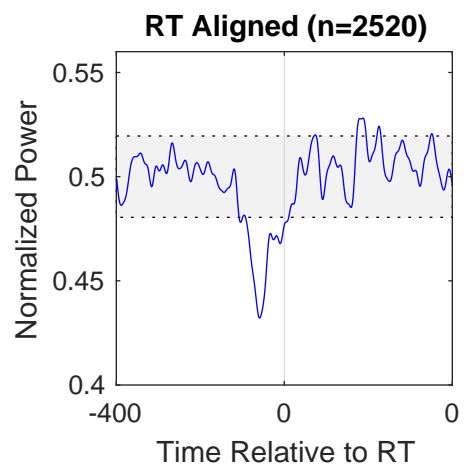
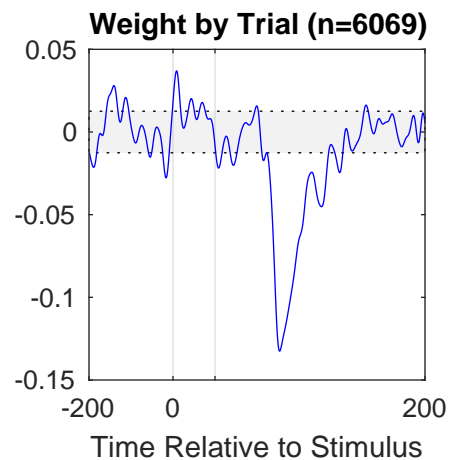
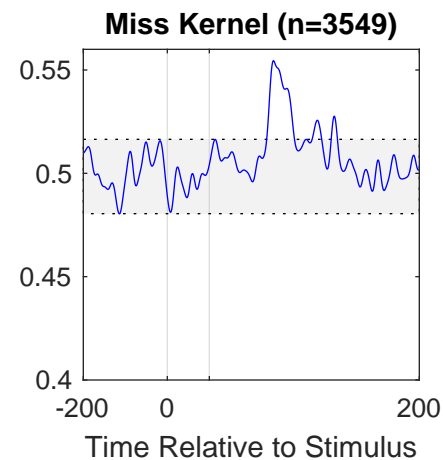
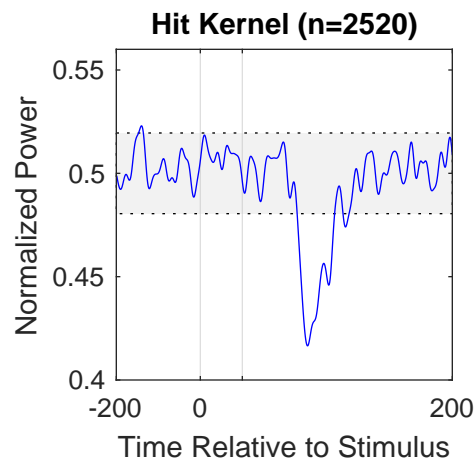
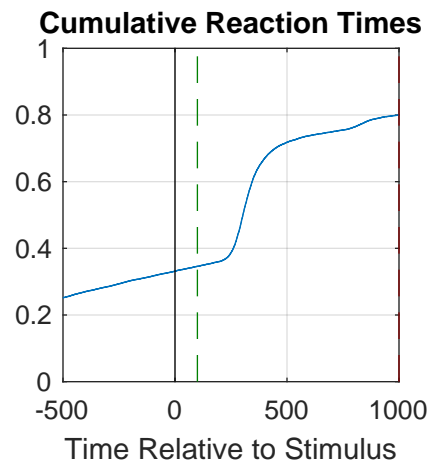
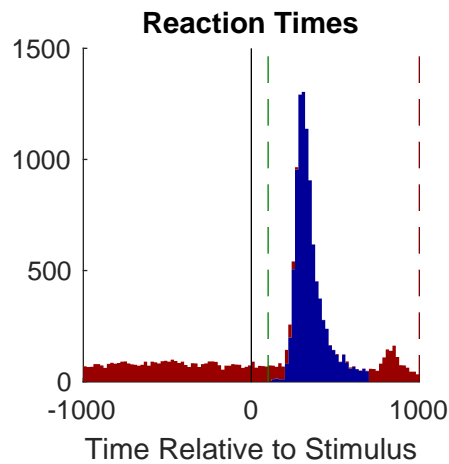
# OKernel

Visual Contrast Step  
40 sessions from 1 animals  
902 (40),  
10 trial minimum for hits/misses  
Delta d'  $\geq 0.40$   
Avg(SD) d' noStim: 2.09 (0.70)  
Avg(SD) d' stim: 1.10 (0.53)  
Avg(SD) delta d': 0.99 (0.43)



# OKernel

Visual Contrast Step  
38 sessions from 1 animals  
902 (38),  
10 trial minimum for hits/misses  
Delta d' >=0.45  
Avg(SD) d' noStim: 2.11 (0.71)  
Avg(SD) d' stim: 1.09 (0.54)  
Avg(SD) delta d': 1.02 (0.43)



# OKernel

Visual Contrast Step  
34 sessions from 1 animals  
902 (34),  
10 trial minimum for hits/misses  
Delta d' >=0.50  
Avg(SD) d' noStim: 2.17 (0.71)  
Avg(SD) d' stim: 1.09 (0.55)  
Avg(SD) delta d': 1.08 (0.40)

