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Question 1

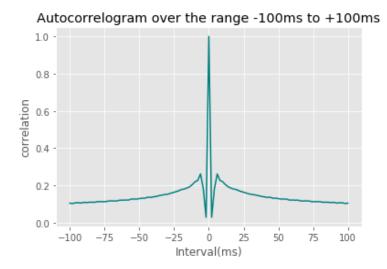
| With no refractory period | | |
|--|--------------------|--|
| Fano factor (over windows of width 10 ms) | 1.0028309352517986 | |
| Fano factor (over windows of width 50 ms) | 1.0014352517985612 | |
| Fano factor (over windows of width 100 ms) | 1.0059208633093526 | |
| Coefficient of variation | 1.0057825931561222 | |

| With a refractory period of 5ms | | |
|--|--------------------|--|
| Fano factor (over windows of width 10 ms) | 0.7478558033161806 | |
| Fano factor (over windows of width 50 ms) | 0.6995991995425956 | |
| Fano factor (over windows of width 100 ms) | 0.6827890222984563 | |
| Coefficient of variation | 0.8203865805279734 | |

Question 2

| A fly H1 neuro | | |
|--|--------------------|--|
| Fano factor (over windows of width 10 ms) | 1.1198442813566911 | |
| Fano factor (over windows of width 50 ms) | 2.9333009948508413 | |
| Fano factor (over windows of width 100 ms) | 4.107101234118765 | |
| Coefficient of variation | 2.0085523370640965 | |

Question 3



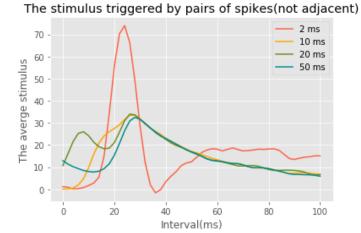
Question 4

The spike triggered average over a 100ms window

30 - 25 - 20 - 20 - 20 - 40 60 80 100 Interval(ms)

COMS2127

Where the spikes are not necessarily adjacent



Where the spikes are necessarily adjacent

