

Summer Research Report Part 3 - Heatmaps

August 2, 2022

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1 Heatmap of heatmaps (C_v measured for waiting time between master channel and first occurrence)

1.1 Heat maps for Plating 1, Culture 3

1.1.1 Heat map for Plating 1, Culture 3, DIV 4



1.1.2 Heat map for Plating 1, Culture 3, DIV 13



1.1.3 Heat map for Plating 1, Culture 3, DIV 25



1.2 Heat maps for Plating 2, Culture 2

1.2.1 Heat map for Plating 2, Culture 2, DIV 4



1.2.2 Heat map for Plating 2, Culture 2, DIV 19



1.2.3 Heat map for Plating 2, Culture 2, DIV 35

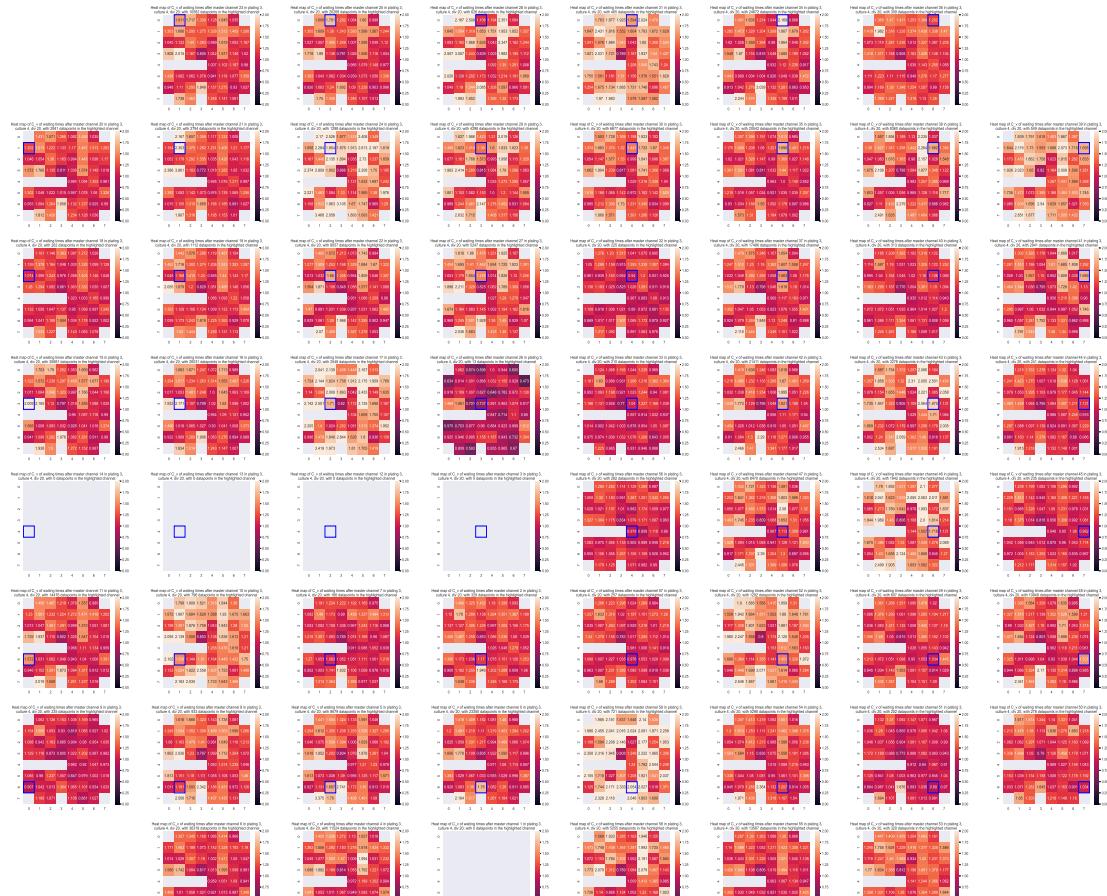


1.3 Heat maps for Plating 3, Culture 4

1.3.1 Heat map for Plating 3, Culture 4, DIV 7

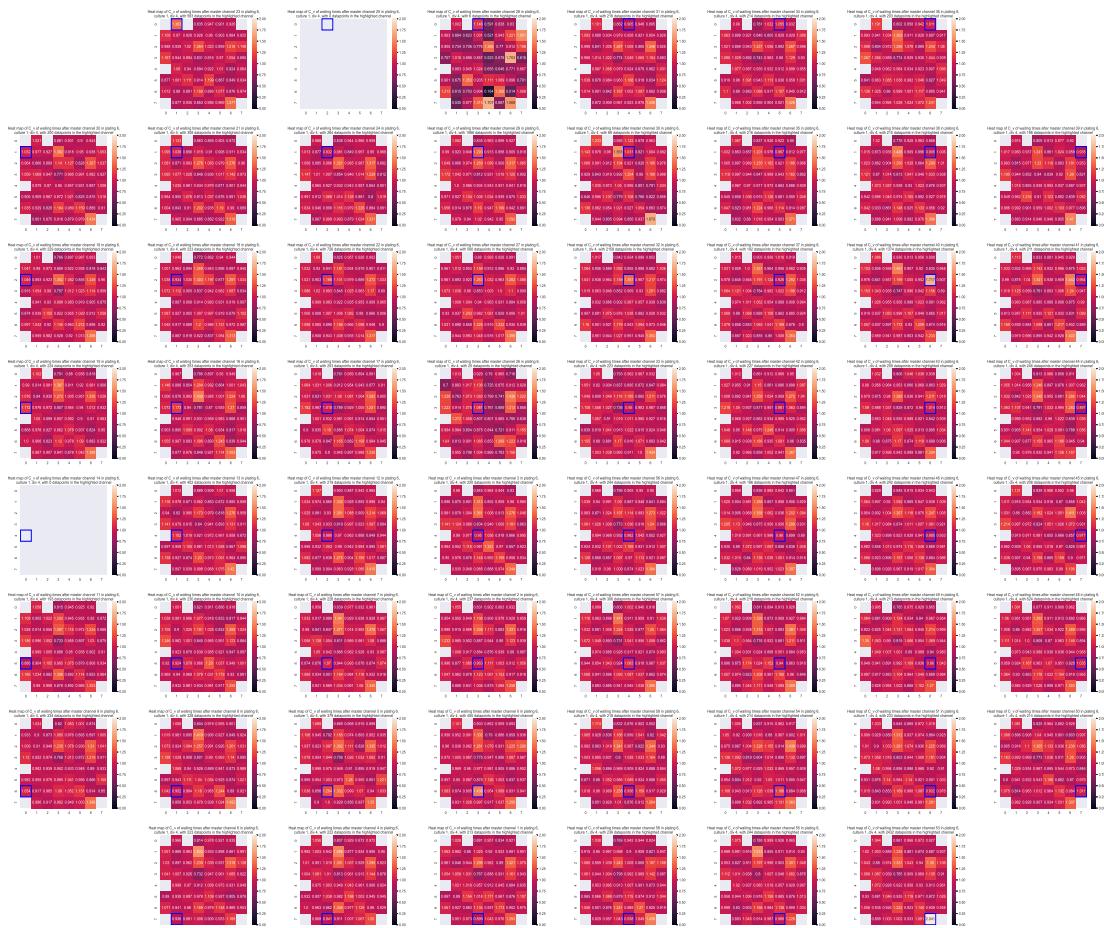


1.3.2 Heat map for Plating 3, Culture 4, DIV 20



1.4 Heat maps for Plating 6, Culture 1

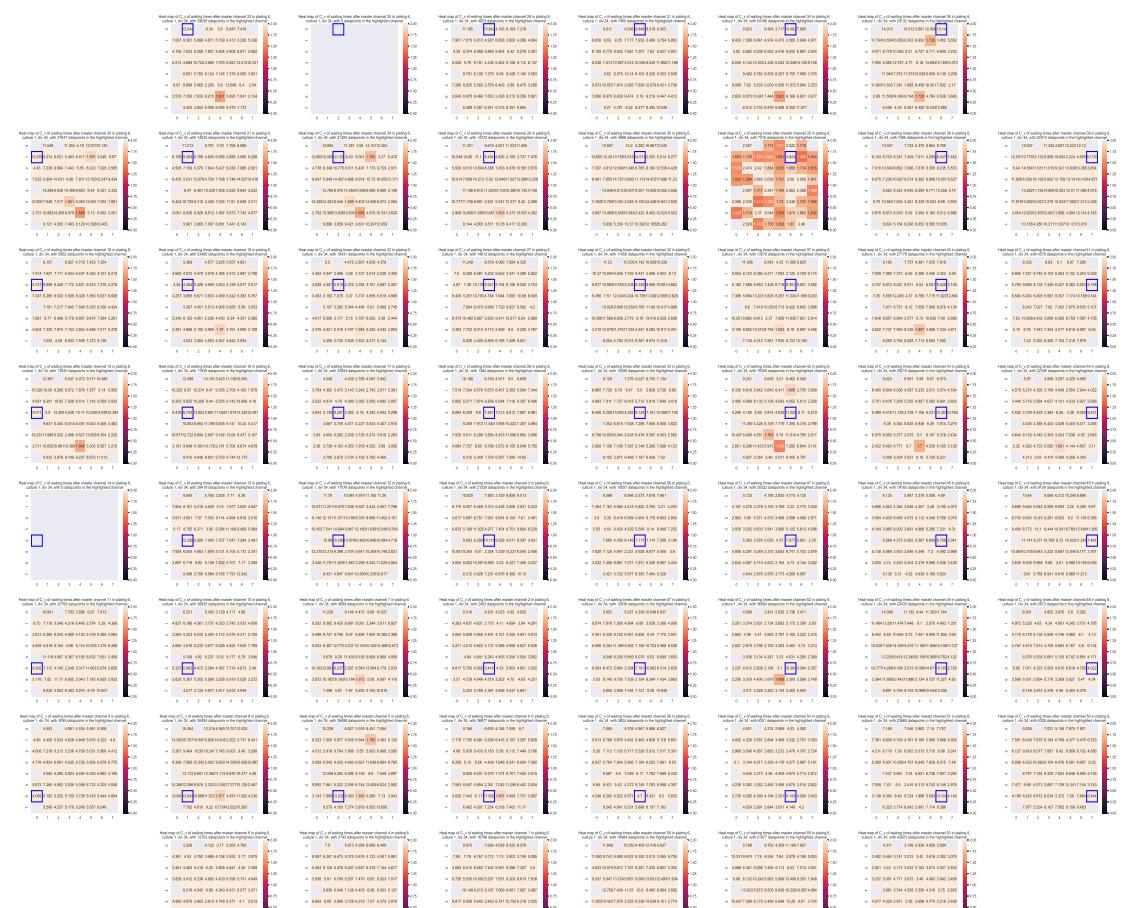
1.4.1 Heat map for Plating 6, Culture 1, DIV 4



1.4.2 Heat map for Plating 6, Culture 1, DIV 19



1.4.3 Heat map for Plating 6, Culture 1, DIV 34



2 Heatmap of heatmaps (Proportion of spikes which occur directly after master channel)

2.1 Heat maps for Plating 1, Culture 3

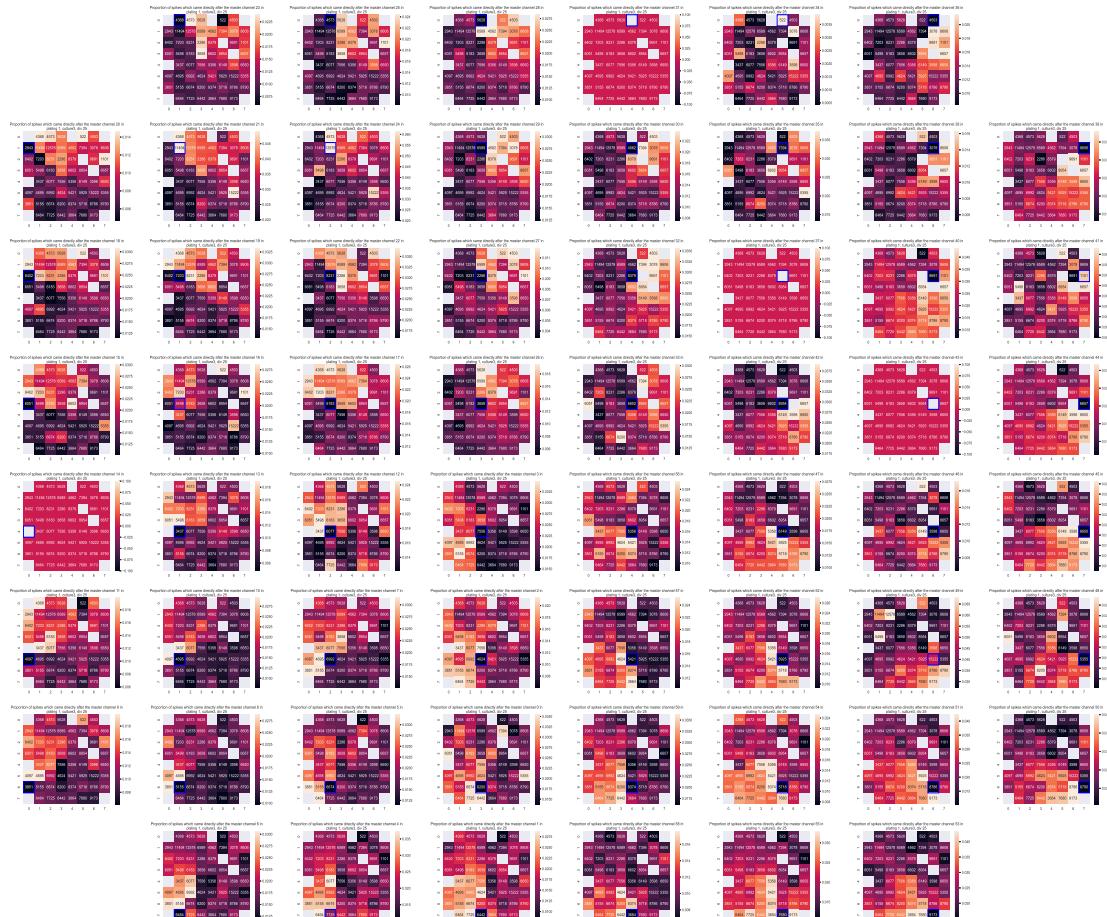
2.1.1 Heat map for Plating 1, Culture 3, DIV 4



2.1.2 Heat map for Plating 1, Culture 3, DIV 13

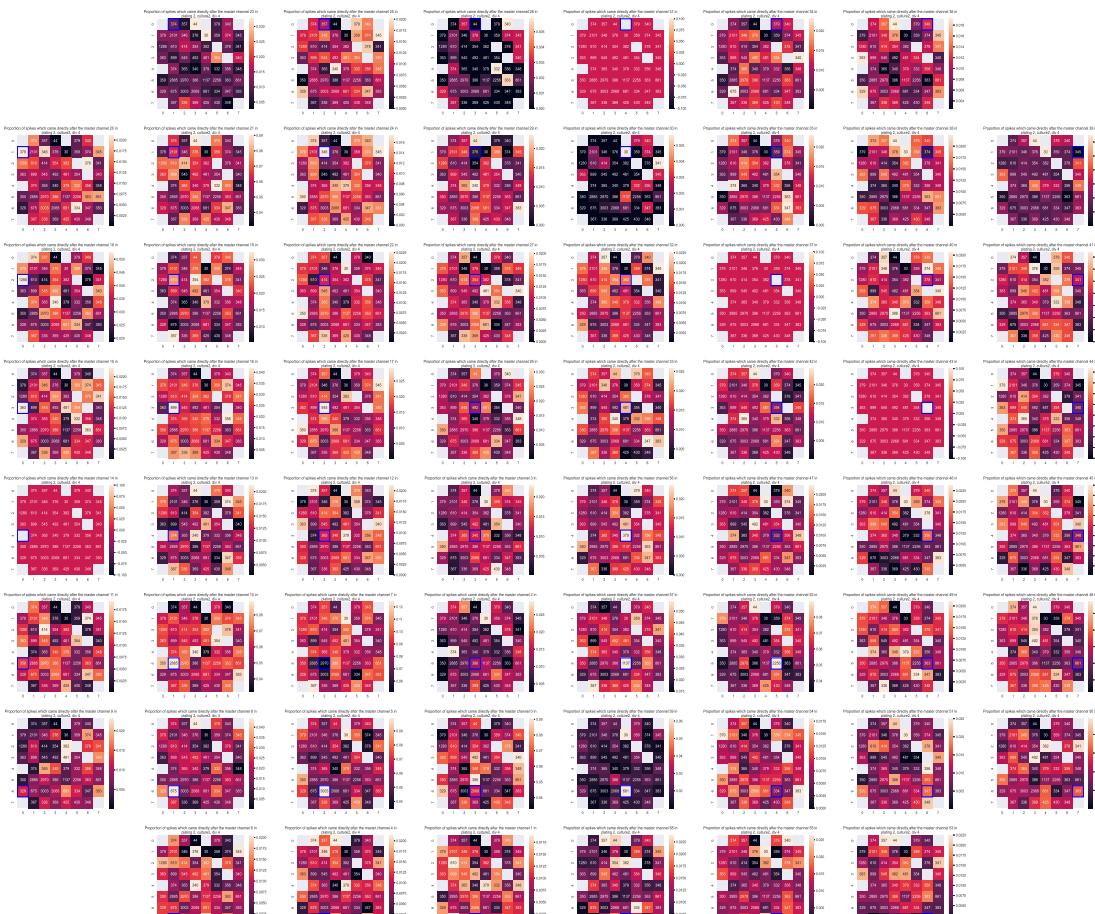


2.1.3 Heat map for Plating 1, Culture 3, DIV 25



2.2 Heat maps for Plating 2, Culture 2

2.2.1 Heat map for Plating 2, Culture 2, DIV 4



2.2.2 Heat map for Plating 2, Culture 2, DIV 19



2.2.3 Heat map for Plating 2, Culture 2, DIV 35



2.3 Heat maps for Plating 3, Culture 4

2.3.1 Heat map for Plating 3, Culture 4, DIV 7



2.3.2 Heat map for Plating 3, Culture 4, DIV 20



2.3.3 Heat map for Plating 3, Culture 4, DIV 31



2.4 Heat maps for Plating 6, Culture 1

2.4.1 Heat map for Plating 6, Culture 1, DIV 4



2.4.2 Heat map for Plating 6, Culture 1, DIV 19



2.4.3 Heat map for Plating 6, Culture 1, DIV 34



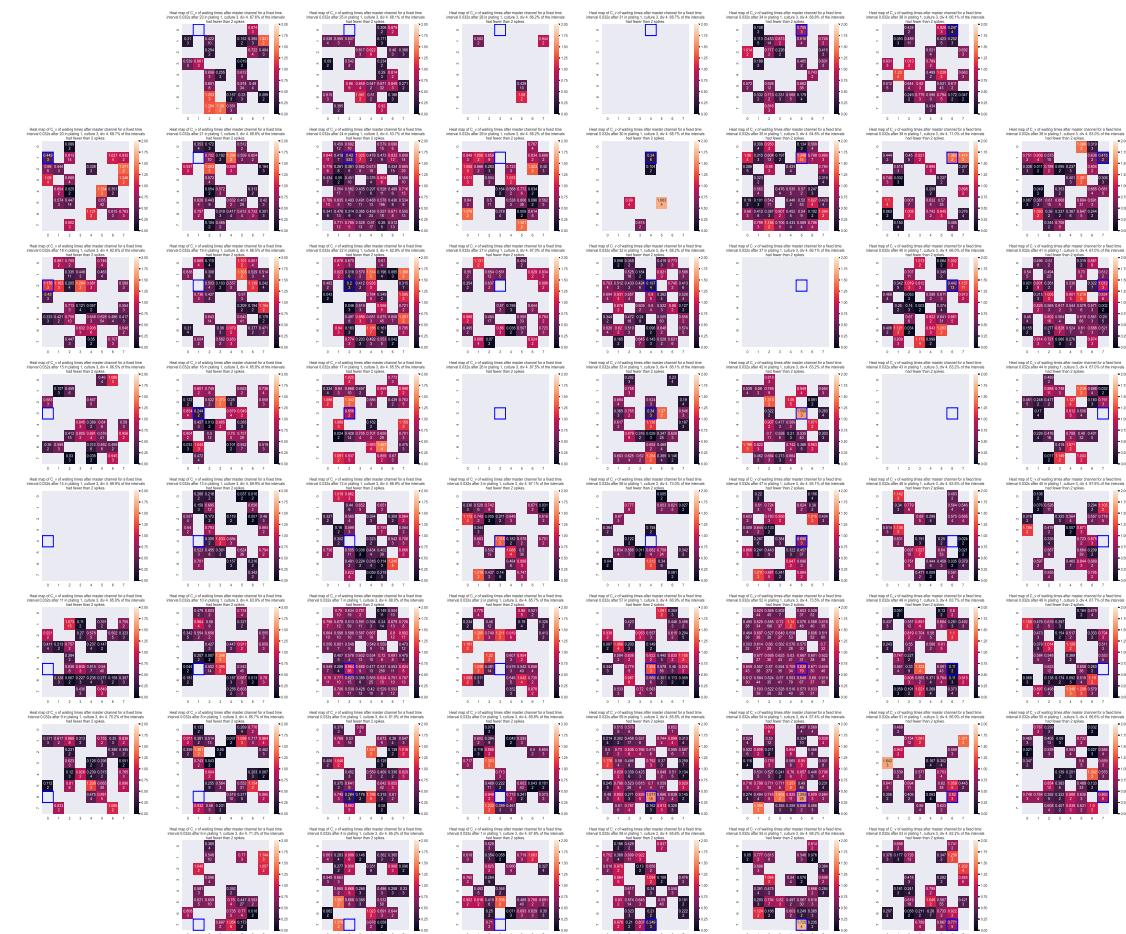
3 Heatmap of heatmaps (C_v measured for waiting time between master channel and first occurrence, in a fixed time interval)

The fixed time interval is determined by the expected time interval between spikes of the most common channel in the div divided by 4.

Given a uniform distribution $U \sim [0, x]$, the $C_v = \frac{\sigma}{\mu} = \frac{\sqrt{12}}{6}$

3.1 Heat maps for Plating 1, Culture 3

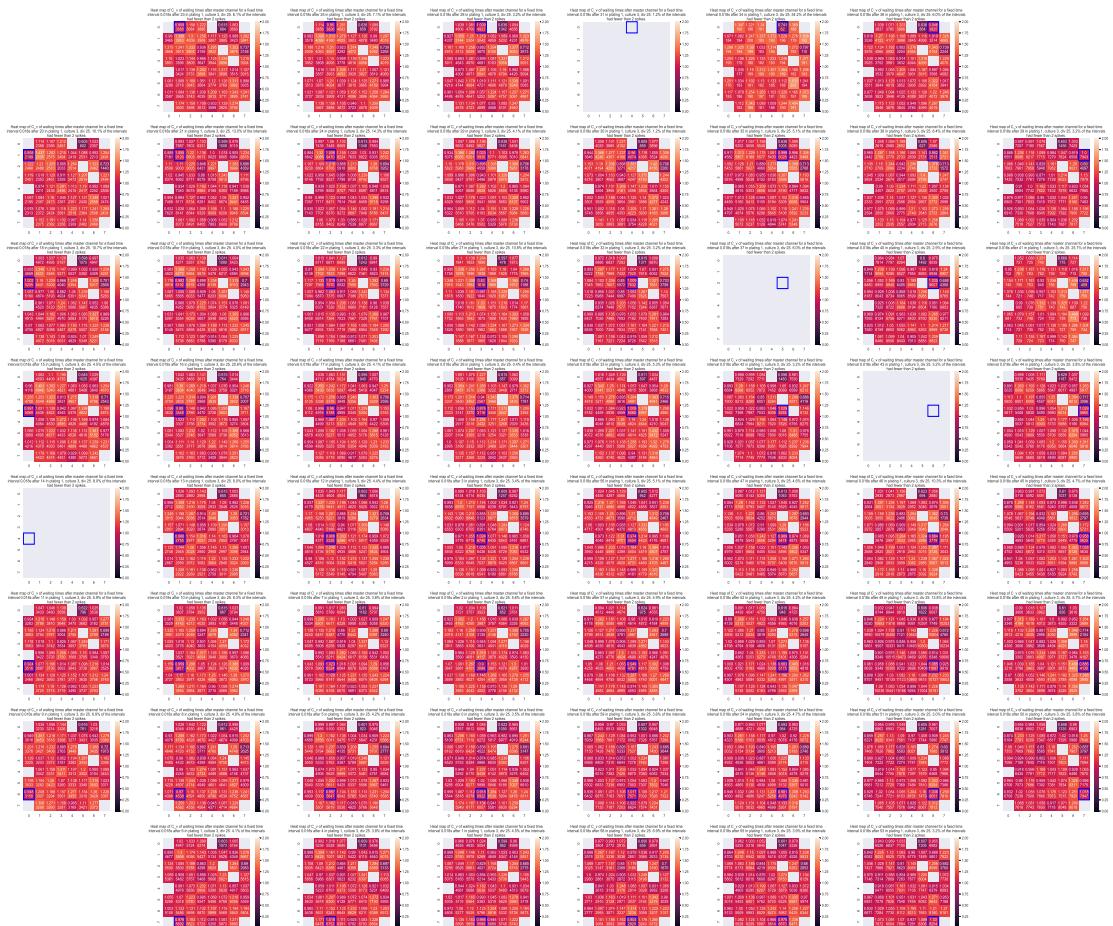
3.1.1 Heat map for Plating 1, Culture 3, DIV 4



3.1.2 Heat map for Plating 1, Culture 3, DIV 13



3.1.3 Heat map for Plating 1, Culture 3, DIV 25



3.2 Heat maps for Plating 2, Culture 2

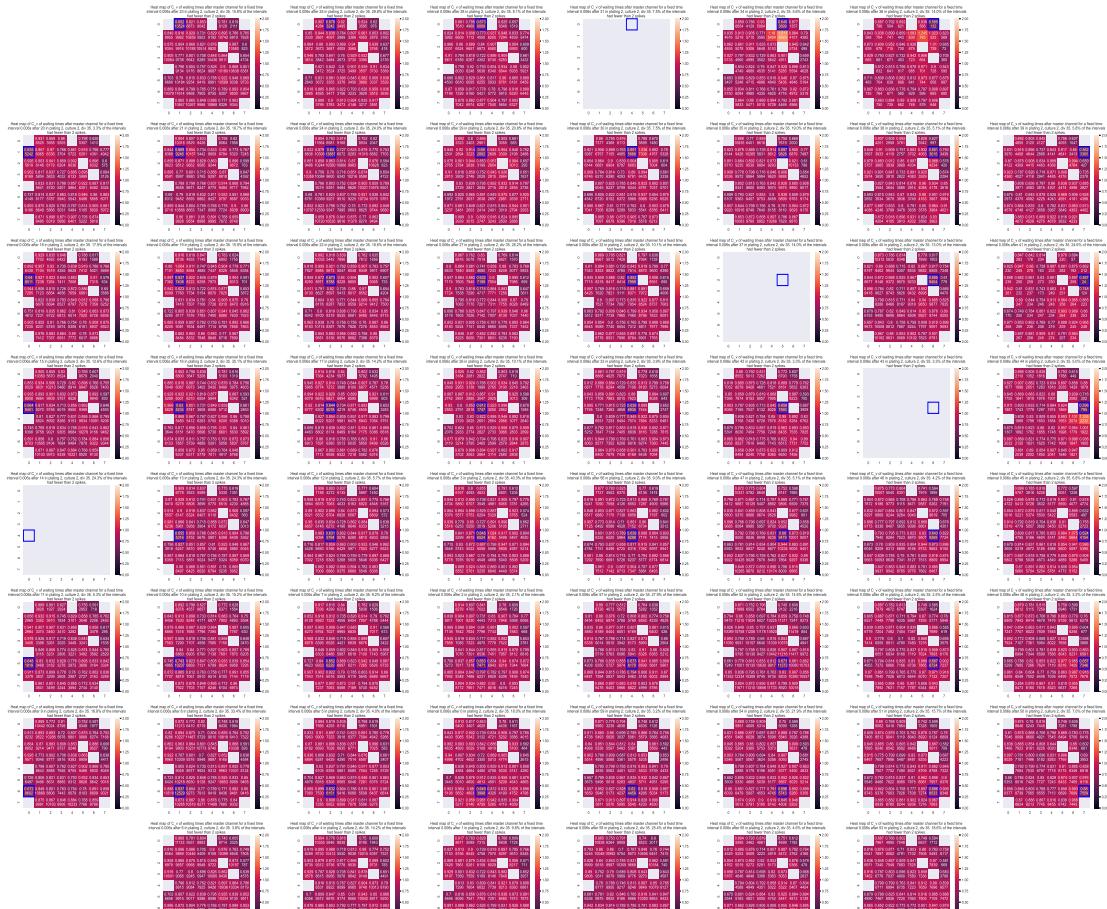
3.2.1 Heat map for Plating 2, Culture 2, DIV 4



3.2.2 Heat map for Plating 2, Culture 2, DIV 19

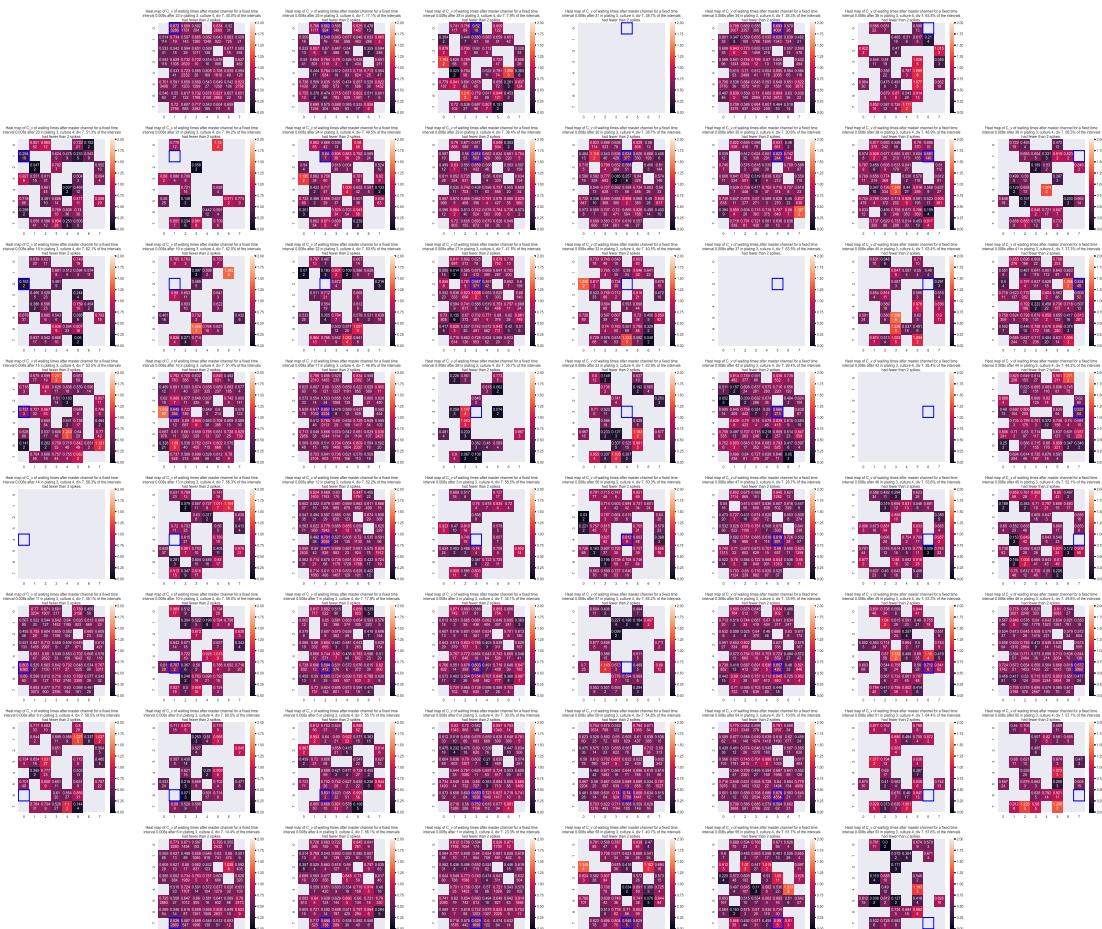


3.2.3 Heat map for Plating 2, Culture 2, DIV 35



3.3 Heat maps for Plating 3, Culture 4

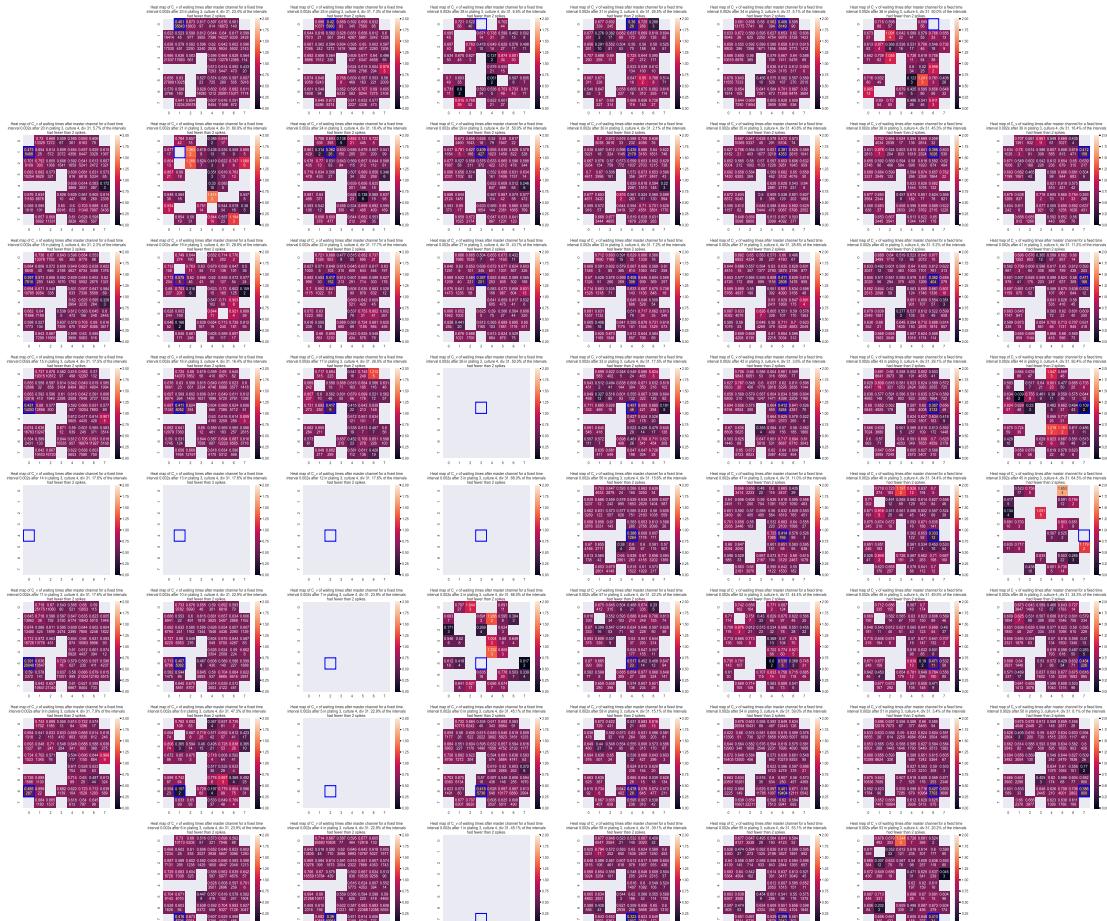
3.3.1 Heat map for Plating 3, Culture 4, DIV 7



3.3.2 Heat map for Plating 3, Culture 4, DIV 20

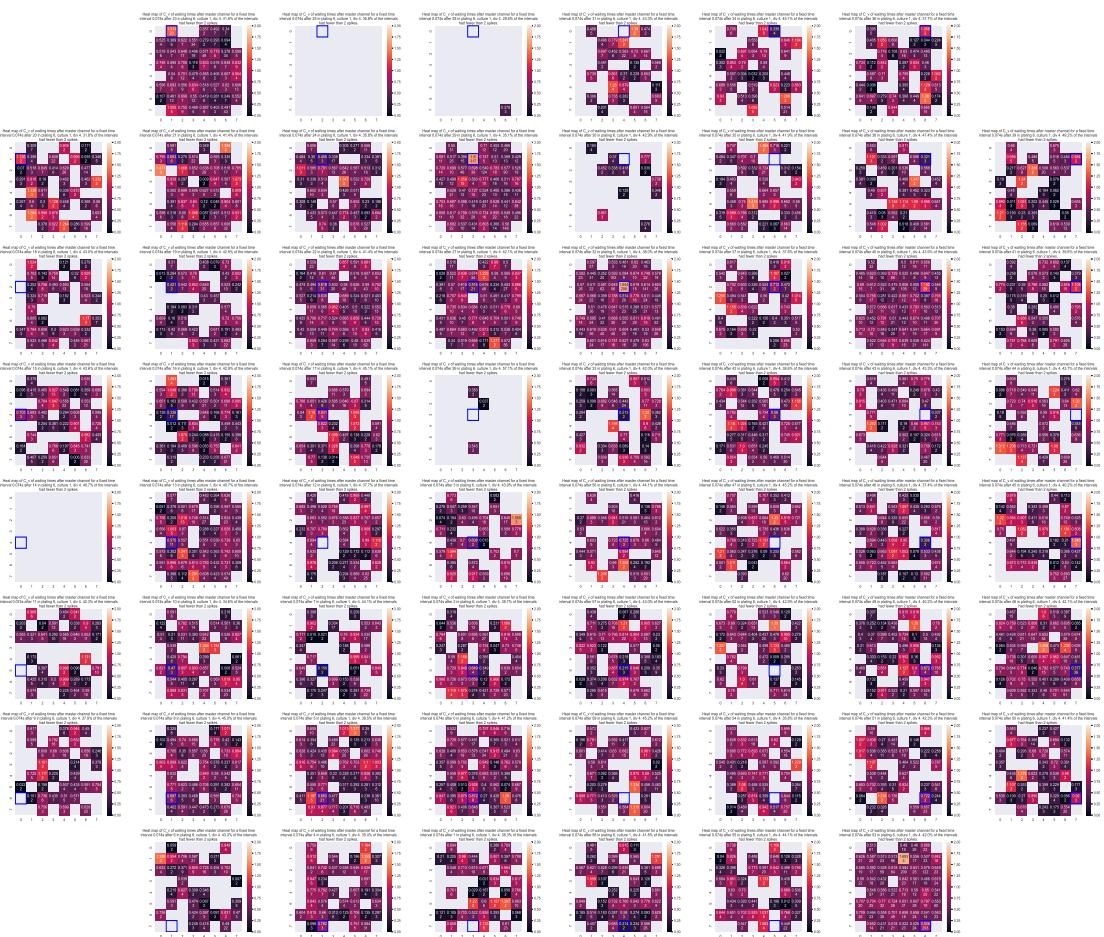


3.3.3 Heat map for Plating 3, Culture 4, DIV 31

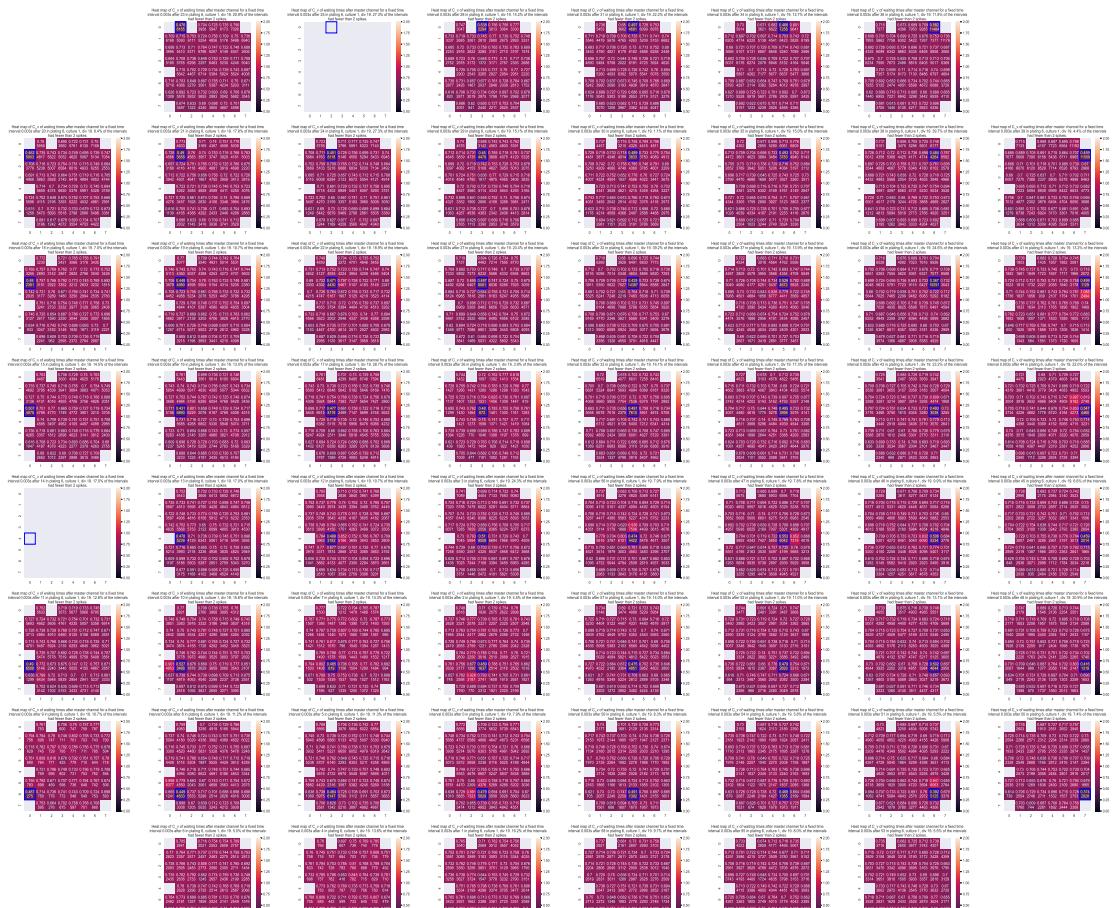


3.4 Heat maps for Plating 6, Culture 1

3.4.1 Heat map for Plating 6, Culture 1, DIV 4



3.4.2 Heat map for Plating 6, Culture 1, DIV 19



3.4.3 Heat map for Plating 6, Culture 1, DIV 34

