## Table S1. ExMISA Network Parameters

<table>
<thead>
<tr>
<th>ExMISA Parameters</th>
<th>Value in [1/k]</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>$g_0$</td>
<td>4.0</td>
<td>basal/ repressed expression rate</td>
</tr>
<tr>
<td>$g_1$</td>
<td>18.0</td>
<td>activated expression rate</td>
</tr>
<tr>
<td>$h_a$</td>
<td>$1 \times 10^{-5}$</td>
<td>binding rate of activator</td>
</tr>
<tr>
<td>$h_r$</td>
<td>$1 \times 10^{-1}$</td>
<td>binding rate of repressor</td>
</tr>
<tr>
<td>$f_a$</td>
<td>$1 \times 10^{-5}$</td>
<td>unbinding rate of activator</td>
</tr>
<tr>
<td>$f_r$</td>
<td>1</td>
<td>unbinding rate of repressor</td>
</tr>
<tr>
<td>$k$</td>
<td>1</td>
<td>transcription factor degradation rate</td>
</tr>
</tbody>
</table>