

1 **Supplementary Table 3: Top 25 hypothetical genes increased or decreased by >2.5 fold by**
 2 **1E2, CSP2, and/or controls**
 3 S3a. Differentially expressed genes, increased in expression by > 2.5 fold comparing CSP2-
 4 treated and untreated A66.1 cells.

| SEQ_ID | Fold change |
|---------------------|--------------------|
| SP_0125080700000118 | 48.2 |
| SP_2048080700001929 | 34.0 |
| SP_2047080700001928 | 29.7 |
| SP_2049080700001930 | 26.5 |
| SP_0018080700000017 | 22.5 |
| SP_1945080700001829 | 18.1 |
| SP_0958080700000888 | 14.2 |
| SP_1481080700001385 | 12.8 |
| SP_1480080700001384 | 12.7 |
| SP_0031080700000028 | 12.0 |
| SP_0029080700000026 | 11.9 |
| SP_1716080700001608 | 11.4 |
| SP_1810080700001698 | 11.1 |
| SP_0547080700000513 | 10.6 |
| SP_0782080700000728 | 10.6 |
| SP_1986080700001870 | 10.3 |
| SP_0543080700000509 | 8.5 |
| SP_0546080700000512 | 8.1 |

5
 6
 7
 8

- 1 S3b. Differentially expressed genes, increased in expression by > 2.5 fold comparing CSP2-
- 2 treated and CSP2 plus 1E2-treated A66.1 cells at two minutes

| SEQ_ID | Fold change |
|---------------------|--------------------|
| SP_1480080700001384 | 5.6 |
| SP_0782080700000728 | 4.4 |
| SP_0518080700000485 | 4.4 |
| SP_1810080700001698 | 3.9 |
| SP_1481080700001385 | 3.9 |
| SP_0822080700000764 | 3.4 |
| SP_1096080700001018 | 3.2 |
| SP_1150080700001069 | 3.1 |
| SP_0099080700000093 | 3.0 |
| SP_1494080700001396 | 2.9 |
| SP_0800080700000746 | 2.8 |
| SP_2143080700002018 | 2.7 |
| SP_0031080700000028 | 2.7 |
| SP_1938080700001822 | 2.7 |
| SP_0319080700000302 | 2.7 |
| SP_0022080700000021 | 2.6 |
| SP_2144080700002019 | 2.6 |

- 3
- 4
- 5
- 6
- 7

1 S3c. Differentially expressed genes, increased in expression by > 2.5 fold comparing CSP2-
2 treated and CSP2 plus 1E2-treated A66.1 cells at eight minutes

| SEQ ID | Fold change |
|---------------------|-------------|
| SP_1882080700001769 | 3.9 |
| SP_0748080700000694 | 3.5 |
| SP_1696080700001588 | 3.4 |
| SP_1556080700001453 | 3.4 |
| SP_0195080700000182 | 3.3 |
| SP_0822080700000764 | 2.8 |

3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18

- 1 S3d. Differentially expressed genes, increased in expression by > 2.5 fold comparing 1E2-treated
- 2 and untreated A66.1 cells.

| SEQ_ID | Fold change |
|---------------------|--------------------|
| SP_0888080700000825 | 5.4 |
| SP_0162080700000151 | 4.3 |
| SP_0172080700000160 | 4.2 |
| SP_1134080700001054 | 3.5 |
| SP_0956080700000886 | 3.3 |
| SP_1760080700001650 | 3.2 |
| SP_0073080700000069 | 2.9 |
| SP_1635080700001528 | 2.9 |
| SP_1740080700001631 | 2.7 |
| SP_1949080700001833 | 2.6 |
| SP_1143080700001063 | 2.6 |
| SP_2144080700002019 | 2.6 |
| SP_2143080700002018 | 2.6 |
| SP_1741080700001632 | 2.6 |
| SP_1660080700001553 | 2.6 |
| SP_1307080700001220 | 2.6 |
| SP_1768080700001658 | 2.5 |

- 3
- 4
- 5
- 6
- 7

- 1 S3e. Differentially expressed genes, reduced in expression >2.5 fold by CSP2-treated compared
- 2 to untreated A66.1 cells

| SEQ_ID | Fold change |
|---------------------|-------------|
| SP_1036080700000961 | 4.4 |
| SP_1170080700001089 | 4.3 |
| SP_0679080700000631 | 4.3 |
| SP_0763080700000709 | 4.0 |
| SP_0472080700000440 | 4.0 |
| SP_1694080700001586 | 4.0 |
| SP_1658080700001551 | 3.7 |
| SP_1052080700000976 | 3.7 |
| SP_1424080700001331 | 3.6 |
| SP_1428080700001335 | 3.4 |
| SP_2118080700001995 | 3.4 |
| SP_1657080700001550 | 3.3 |
| SP_0705080700000655 | 3.0 |
| SP_1630080700001523 | 3.0 |
| SP_0693080700000645 | 2.9 |
| SP_0270080700000255 | 2.8 |
| SP_0706080700000656 | 2.8 |
| SP_0449080700000419 | 2.7 |
| SP_1910080700001795 | 2.7 |
| SP_0238080700000225 | 2.7 |
| SP_2132080700002008 | 2.7 |
| SP_1947080700001831 | 2.6 |

| | |
|---------------------|-----|
| SP_1958080700001842 | 2.6 |
| SP_2117080700001994 | 2.6 |
| SP_1545080700001442 | 2.6 |
| SP_0077080700000073 | 2.6 |
| SP_0174080700000162 | 2.6 |
| SP_1030080700000955 | 2.6 |
| SP_1209080700001126 | 2.6 |
| SP_0482080700000450 | 2.6 |
| SP_0076080700000072 | 2.6 |
| SP_0694080700000646 | 2.5 |

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

- 1 S3f. Differentially expressed genes, reduced in expression >2.5 fold by CSP2-treated compared
- 2 to CPS2 plus 1E2-treated A66.1 cells at two minutes

| SEQ_ID | Fold change |
|---------------------|--------------------|
| SP_0728080700000676 | 5.2 |
| SP_1036080700000961 | 3.5 |
| SP_0679080700000631 | 3.2 |
| SP_1052080700000976 | 2.6 |
| SP_0763080700000709 | 2.6 |
| SP_1788080700001676 | 2.5 |

- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14
- 15
- 16
- 17
- 18

- 1 S3g. Differentially expressed genes, reduced in expression >2.5 fold by CSP2-treated compared
- 2 to CPS2 plus 1E2-treated A66.1 cells at eight minutes

| SEQ_ID | Fold change |
|---------------------|--------------------|
| SP_2233080700002098 | 4.8 |
| SP_0304080700000288 | 4.3 |
| SP_2160080700002032 | 3.8 |
| SP_1935080700001819 | 3.2 |
| SP_1832080700001720 | 3.2 |
| SP_0114080700000107 | 3.0 |
| SP_0133080700000123 | 2.9 |
| SP_0098080700000092 | 2.9 |
| SP_1628080700001521 | 2.8 |
| SP_1422080700001329 | 2.7 |
| SP_1494080700001396 | 2.7 |
| SP_0108080700000102 | 2.7 |
| SP_0003080700000003 | 2.7 |
| SP_1835080700001723 | 2.7 |
| SP_1934080700001818 | 2.6 |
| SP_1223080700001139 | 2.5 |

- 3
- 4
- 5
- 6
- 7

- 1 S3h. Differentially expressed genes, reduced in expression >2.5 fold by 1E2-treated compared to
- 2 untreated A66.1 cells

| SEQ_ID | Fold change |
|---------------------|--------------------|
| SP_1977080700001861 | 6.2 |
| SP_1170080700001089 | 5.8 |
| SP_1052080700000976 | 4.3 |
| SP_1036080700000961 | 4.0 |
| SP_0763080700000709 | 3.8 |
| SP_0699080700000650 | 3.7 |
| SP_0238080700000225 | 3.6 |
| SP_0472080700000440 | 3.5 |
| SP_1958080700001842 | 3.4 |
| SP_2124080700002000 | 3.4 |
| SP_0503080700000470 | 3.0 |
| SP_1424080700001331 | 2.8 |
| SP_0694080700000646 | 2.8 |
| SP_1579080700001476 | 2.8 |
| SP_1694080700001586 | 2.7 |
| SP_0634080700000592 | 2.7 |
| SP_0174080700000162 | 2.6 |
| SP_0596080700000557 | 2.6 |
| SP_0633080700000591 | 2.6 |
| SP_0543080700000509 | 2.5 |

1 S3i. Differentially expressed genes, reduced in expression >2.5 fold by 1E2-treated compared to
2 untreated A66.1 cells

| SEQ_ID | Fold change |
|---------------------|------------------------|
| SP_1150080700001069 | 2.9 |

3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23