

Table S3 Ten residues in each mutant showing maximum difference (increase or decrease) in the betweenness centrality, as compared to WT. Residues common to all the mutant PCNs are shown in yellow and those common in three or more, out of six mutants are shown in cyan

| Positive | 1T4M- 1I6W | | 1T2N- 1I6W | | 3D2A- 1I6W | | 3D2B- 1I6W | | 3D2C- 1I6W | | 3QMM- 1I6W |
|----------|---------------|-----|---------------|-----|---------------|-----|---------------|-----|---------------|-----|---------------|
| 59 | 0.042 | 59 | 0.042 | 18 | 0.023 | 18 | 0.022 | 83 | 0.038 | 88 | 0.017 |
| 7 | 0.038 | 7 | 0.040 | 81 | 0.022 | 173 | 0.016 | 75 | 0.034 | 173 | 0.017 |
| 25 | 0.015 | 18 | 0.023 | 72 | 0.020 | 88 | 0.015 | 18 | 0.023 | 81 | 0.015 |
| 173 | 0.015 | 173 | 0.017 | 173 | 0.016 | 72 | 0.015 | 173 | 0.015 | 72 | 0.014 |
| 72 | 0.010 | 146 | 0.017 | 63 | 0.015 | 25 | 0.013 | 72 | 0.015 | 25 | 0.014 |
| 18 | 0.010 | 88 | 0.015 | 70 | 0.015 | 3 | 0.012 | 88 | 0.014 | 3 | 0.013 |
| 166 | 0.010 | 25 | 0.015 | 51 | 0.014 | 38 | 0.012 | 25 | 0.013 | 143 | 0.010 |
| 38 | 0.009 | 72 | 0.010 | 10 | 0.014 | 114 | 0.009 | 52 | 0.013 | 48 | 0.010 |
| 11 | 0.009 | 114 | 0.010 | 25 | 0.014 | 83 | 0.009 | 3 | 0.012 | 11 | 0.010 |
| 41 | 0.008 | 166 | 0.008 | 83 | 0.013 | 123 | 0.009 | 38 | 0.012 | 166 | 0.009 |
| Negative | | | | | | | | | | | |
| 39 | -0.037 | 39 | -0.037 | 39 | -0.055 | 98 | -0.018 | 98 | -0.022 | 98 | -0.022 |
| 19 | -0.018 | 98 | -0.019 | 58 | -0.029 | 19 | -0.016 | 55 | -0.019 | 36 | -0.014 |
| 55 | -0.017 | 130 | -0.019 | 16 | -0.024 | 22 | -0.014 | 19 | -0.018 | 82 | -0.012 |
| 98 | -0.015 | 19 | -0.018 | 19 | -0.019 | 16 | -0.013 | 39 | -0.017 | 141 | -0.011 |
| 22 | -0.014 | 16 | -0.017 | 76 | -0.018 | 122 | -0.012 | 92 | -0.017 | 22 | -0.011 |
| 16 | -0.012 | 103 | -0.017 | 22 | -0.015 | 124 | -0.011 | 16 | -0.017 | 124 | -0.011 |
| 58 | -0.011 | 55 | -0.017 | 55 | -0.013 | 116 | -0.010 | 22 | -0.015 | 87 | -0.010 |
| 37 | -0.010 | 125 | -0.016 | 98 | -0.012 | 39 | -0.009 | 80 | -0.013 | 122 | -0.010 |
| 70 | -0.010 | 22 | -0.014 | 122 | -0.012 | 36 | -0.009 | 82 | -0.013 | 78 | -0.010 |
| 32 | -0.008 | 58 | -0.012 | 78 | -0.011 | 23 | -0.009 | 96 | -0.011 | 160 | -0.008 |