| Mutant | Quickchange Primer |
|--------|--------------------|
|        | **Forward** | **Reverse** |
| I52A   | GGCACTGGCGCGATGACCAGCGC | GGCCACACACACCTTGCTACCCCTT |
| G70A   | CGCCTGGCGCTCTAGAGGATCACAGG | GACATGGCCAGAGATGTTGGCG |
| S71A   | CTGGGCCGAGTGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| M72A   | CTGGGCTCTGCGAGGATCACAGG | GCGGACATGGCCAGAGATGTTGGCG |
| P102A  | GCCGGCGAAAGCGCCACGAACTC | GACMTGCCCGCCACTGCCCCTC |
| G70A   | CGCCTGGCGCTCTAGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| W111A  | CTGGGCGCTCTGCGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| P141A  | CTGGGCGCTCTGCGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| Q143A  | CTGGGCGCTCTGCGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| P147A  | CTGGGCGCTCTGCGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| E148A  | CTGGGCGCTCTGCGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| F149A  | CTGGGCGCTCTGCGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| C190A  | CTGGGCGCTCTGCGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |
| E191A  | CTGGGCGCTCTGCGAGGATCACAGG | GCCGACATGGCCAGAGATGTTGGCG |

**Protein expression**

| Oligonucleotide Sequences |
|---------------------------|
| His-Sumo-NS5A DI 35-215 (WT C142A C190A and E191A) |
| **Forward** | CTGCCCGGATCCCCCTTCATCTCTTGCTAAAGGG |
| **Reverse** | CGTGCCCCTCAGTTACGCCGCGATGCTCCGCCGTG |
| pCDNA3.1-PKR |
| **Forward** | CGCGGATCCATGGCTGGTGTCTTCAGCA |
| **Reverse** | GCCCTCGAGCTAACATGTGTGTCCTCCTATTT |

**qRT-PCR**

| Oligonucleotide Sequences |
|---------------------------|
| HCV |
| **Forward** | TCAGGCGACTAACATG |
| **Reverse** | GCCGACAGGTAGATGAC |
| PSMB9 |
| **Forward** | TCTGCAGGTAGATGAC |
| **Reverse** | GCCGACAGGTAGATGAC |

S1 Table: oligonucleotide sequence of primers used in this study