



**Sdal (38)**

1 CGGCGCGCTCGACGATATCTAGAATTCGGATCCTGCAGGGCCACTAGTACATTGTTTGGCTGCACGTTGGATTTTGAATGCTAGGGAACTTGGGAGA  
101 CTCATATTTCTGGGCTAGAGGATCTGTGGACCAAGATCTTTTTATGATGACAGTAGCAATGTATCTGTGGAGCTGGATTCTGGTTGGGAGTGAAGG  
201 AAAAGAATGTAATAAATGCAAGACATCTATTTTCAGGAGCATGAGGAATAAAAGTTCTAGTTTCTGGTCTCAGAGTGGTGCAGGGATCAGGGAGTCTCAC  
301 AATCTCTGAGTGTGGTGTCTTAGGGCACACTGGGTCTGGAGTGCAAAGGATCTAGGCACGTGAGGCTTTGTATGAAGAATCGGGGATCGTACCCACC  
401 CCCTGTTTCTGTTTCATCTGGCGGTGTCTCCTCTGCCTTTGTCCCTAGATGAAGTCTCCATGAGCTACAGGCGCTGGTGCATCCAGGGTGTACTAGTA

**NheI (518)**

501 ATTGCAGAACAGCAAGTCTAGTCTCCCTCCCTCCACAGCTCTGGGTGTGGGAGGGGTTGTCCAGCCTCCAGCAGCATGGGGAGGGCCTTGGTCAG  
601 CCTCTGGGTGCCAGCAGGGCAGGGCGGAGTCTGGGAATGAAGTTTTATAGGGCTCTGGGGAGGCTCCCCAGCCCCAAGTTACACCTGCACCC

**NcoI (715)**

701 GGAGAGCTGTGCACCATGGAATCAAGGTGCTGTTTGCCTCATCTGTATTGCTGTTGCTGAGGCAAAACCCACTGAAATCAATGAAGACCTCAATATA  
801 GCTGCTGTGGCCTCAACTTTGCCACCACAGATCTTGAGACTGACCTGTTACCAACTGGGAGACCATGAATGTGATTAGCACTGACACAGAGCAGGTGA  
29▶ A A V A S N F A T T D L E T D L F T N W E T M N V I S T D T E Q V  
901 ACACAGATGCTGACAGGGCAAGTGCCTGGCAAAAACTCCCCAGATGTCTGAGGGCAATGCCAGAAGGCTGGTTGCACAAGAGG  
62▶ N T D A D R G K L P G K K L P P D V L R E L E A N A R R A G C T R G  
1001 CTGCCTCATTTGCTCTCCACATTAAGTGCACCCCTAAGATGAAGAAATTTATCCCTGGCAGGTGCCACACTTATGAAGGTGAAAAGGAGTCTGCTCAG  
95▶ C L I C L S H I K C T P K M K K F I P G R C H T Y E G E K E S A Q  
1101 GGAGGGATTGGAGAGGCAATTGTTGATATCCCAGAGATTCTGGCTTCAAGGATAAGGAGCCACTGGACCAGTTTATTGCTCAAGTGGACCTCTGTGCTG  
129▶ G G I G E A I V D I P E I P G F K D K E P L D Q F I A Q V D L C A  
1201 ATTGCACCACTGGCTGTCTGAAGGGCCTTGCAATGTCAGTGTCTGACCTCTGAAGAAGTGGCTTCCCCAGAGGTGTACCACTTTTGGCAGCAAGAT  
162▶ D C T T G C L K G L A N V Q C S D L L K K W L P Q R C T T F A S K I

**NheI (1349)**

1301 TCAGGGTAGGGTGGACAAAATCAAGGGTCTGGCTGGGGACAGATGATAGCTAGCTGGCCAGACATGATAAGATACATTGATGAGTTTGGACAAAACCACAA  
195▶ Q G R V D K I K G L A G D R •

**HpaI (1489)**

1401 CTAGAATGCAGTGAATAAATGCTTTATTTGTGAAATTTGTGATGCTATTGCTTTATTTGTAACCATTATAAGCTGCAATAAACAAGTTAACACAACAA  
1501 TTGCATTCATTTATGTTTCAGGTTTCAGGGGAGGTGTGGGAGGTTTTTAAAGCAAGTAAACCTCTACAAATGTGGTATGGAATTAATTCTAAAATAC  
1601 AGCATAGCAAACTTTAACCTCAAATCAAGCCTCTACTTGAATCCTTTTCTGAGGGATGAATAAGGCATAGGCATCAGGGGCTGTTGCCAATGTGCATT  
1701 AGCTGTTTGCAGCCTCACCTTCTTTCATGGAGTTTAAGATATAGTGTATTTTCCCAAGGTTTGAAGTACTGCTTTCATTTCTTTATGTTTTAAATGCACCTG  
1801 ACCTCCACATTCCTTTTATGTAATAATTCAGAAATAATTTAAATACATCATTGCAATGAAAATAAATGTTTTTATTAGGCAGAATCCAGATGCTCA  
1901 AGGCCCTTCATAATATCCCCAGTTTAGTAGTTGGACTTAGGGAACAAAGGAACCTTAAATAGAAATGGACAGCAAGAAAGCGAGCTTCTAGCTTATCC  
2001 TCAGTCTGCTCTCTGCCACAAAGTGCACGCAGTTCGCGGCCGGTGCAGCAGGGCAACTCCCGCCCCACGGTCTCGCCGATCTCGGTCATGGCC  
125▶ • D Q E E A V F H V C N G A P D R L A F E R G W P Q E G I E T M A  
2101 GGCCCGGAGGCGTCCCGAAGTTCGTGGACACGACCTCCGACCACTCGGCGTACAGCTCGTCCAGGCCGCGCACCCACACCCAGGCCAGGGTGTGTCCG  
91▶ P G S A D R F N T S V V E S W E A Y L E D L G R V W V W A L T N D P  
2201 GCACCACCTGGTCTGGACCGCTGATGAACAGGGTACGTCGTCGCGGACACCCGCGAAGTCTCTCCACGAAGTCCCGGGAGAACCCGAGCCG  
58▶ V V Q D Q V A S I F L T V D D R V V G A F D D E V F D R S F G L R  
2301 GTCGGTCCAGAAGTCCGCGCTCCGCGGACGTCGCGCGGTTGACACCGGAACCGGCACTGGTCAACTTGGCCATGATGGCTCCTCTGTCAGGAGAGGA  
25▶ D T W F E V A G A V D R A T L V P V A S T L K A M  
2401 AAGAGAAGAAGGTTAGTACAATTGCTATAGTGAAGTGTATTATACTATGCAGATATACTATGCCAATGATTAATTGTCAAAGTAGGGTGCAGGTTAATT  
2501 AAGAACATGTGAGCAAAAGGCCAGCAAAAGGCCAGGAACCGTAAAAAGGCCGCGTGTGCGCTTTTTCCATAGGCTCCGCCCCCTGACGAGCATCACA  
2601 AAAATCGACGCTCAAGTCAAGGTTGGCGAAACCCGACAGGACTATAAAGATACCAGGCGTTTCCCCTGGAAGCTCCCTCGTGCCTCTCTGTTCCGAC  
2701 CCTGCCGTTACCGGATACCTGTCCGCTTTCTCCCTCGGGAAGCGTGGCGCTTTCTCATAGCTCACGCTGTAGGTATCTCAGTTCGGTGTAGGTCGTT  
2801 CGCTCAAAGCTGGGCTGTGTGCACGAACCCCGTTCAGCCGACCGTGCCTTATCCGGTAACTATCGTCTTGTAGTCAAACCCGTAAGACAGACT  
2901 TATCGCCACTGGCAGCAGCCACTGGTAACAGGATTAGCAGAGCGAGGTATGTAGGCGGTGCTACAGAGTCTTGAAGTGGTGGCTAACTACGGCTACAC  
3001 TAGAAGAACAGTATTTGGTATCTGCGCTCTGCTGAAGCCAGTTACCTTCGAAAAAGAGTTGGTAGCTCTTGATCCGGCAAAACCAACCCGCTGGTAGC  
3101 GGTGTTTTTTTTGTTTGAAGCAGCAGATTACGCGCAGAAAAAAGGATCTCAAGAAGATCCTTTGATCTTTTCTACGGGCTGACGCTCAGTGAAGC  
3201 AAAACTCACGTTAAGGGATTTTGGTCATGGCTAGTTAATTAACATTTAAATCA