```
                                                SA1                                                                  SA2
                                                                          Insert
                                        3'  TGTGAGAAAGGGATGTGCTGCGAGAAGG ———————————— TCTAGCCTTCTCGTGTGCAGACTTGAGGTCAGTG 5'
                                                                    ↓ FIRST INDEXING CYCLE
                     P5                   Index
"P5 INDEXING PRIMER"  5' AATGATACGGCGACCACCGAGATCTACACGCGTAAGAACACTCTTTCCCTACACGACGCTCTT ————————————————————————→ 3'
                                        3'  TGTGAGAAAGGGATGTGCTGCGAGAAGG ———————————— TCTAGCCTTCTCGTGTGCAGACTTGAGGTCAGTG 5'
                                                                    ↓ CYCLE 2+
                                                                
```