PE500

Summary

General

fastp version:	0.19.6 (https://github.com/OpenGene/fastp)
sequencing:	paired end (151 cycles + 151 cycles)
mean length before filtering:	151bp, 151bp
mean length after filtering:	144bp, 144bp
duplication rate:	3.224185%
Insert size peak:	151
Detected read1 adapter:	AGATCGGAAGACCACGTCTGAACTCCAGTCA
Detected read2 adapter:	AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGT

Before filtering

total reads:	626.930540 M
total bases:	94.666512 G
Q20 bases:	88.200403 G (93.169592%)
Q30 bases:	81.377053 G (85.961817%)
GC content:	46.100595%

After filtering

total reads:	565.359598 M
total bases:	81.710817 G
Q20 bases:	78.428463 G (95.982964%)
Q30 bases:	73.255258 G (89.651849%)
GC content:	44.942847%

Filtering result

reads passed filters:	565.359598 M (90.178985%)
reads with low quality:	56.453630 M (9.004766%)
reads with too many N:	7.128000 K (0.001137%)
reads too short:	4.751908 M (0.757964%)
reads with low complexity:	358.276000 K (0.057148%)

Adapters

Adapter or bad ligation of read1

Sequence	Occurrences
A	1033797
AG	929090
AGA	910281

AGAT	864892
AGATC	1194261
AGATCG	1089808
AGATCGG	1145891
AGATCGGA	1264157
AGATCGGAA	1310800
AGATCGGAAG	1277301
AGATCGGAAGA	1207775
AGATCGGAAGAG	1058134
AGATCGGAAGAGC	910279
AGATCGGAAGAGCA	820550
AGATCGGAAGAGCAC	786437
AGATCGGAAGAGCACA	813872
AGATCGGAAGAGCACAC	908839
AGATCGGAAGAGCACACG	1006370
AGATCGGAAGAGCACACGT	1002422
AGATCGGAAGAGCACACGTC	986905
AGATCGGAAGAGCACACGTCT	873885
AGATCGGAAGAGCACACGTCTG	740622
AGATCGGAAGAGCACACGTCTGA	665831
AGATCGGAAGAGCACACGTCTGAA	614666
AGATCGGAAGAGCACACGTCTGAACTC	649963
AGATCGGAAGAGCACACGTCTGAACTCC	748354
AGATCGGAAGAGCACACGTCTGAACTCCA	898526
AGATCGGAAGAGCACACGTCTGAACTCCAG	926427
AGATCGGAAGAGCACACGTCTGAACTCCAGT	808516
AGATCGGAAGAGCACACGTCTGAACTCCAGTC	4895689
AGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAAC	656218
AGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACC	733345
AGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCT	698774
other adapter sequences	26630405

Adapter or bad ligation of read2

AGATCGGA

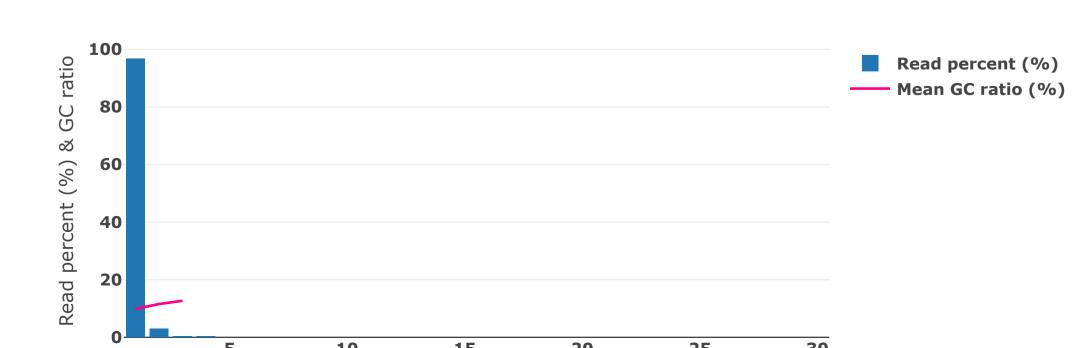
Sequence	Occurrences
A	1035436
AG	925342
AGA	911933
AGAT	869486
AGATC	1190869
AGATCG	1096609
AGATCGG	1171712

1261295

AGATCGGAAGA 12777788 AGATCGGAAGA 1195126 AGATCGGAAGAG 1065882 AGATCGGAAGAGC 915860 AGATCGGAAGAGC 823785 AGATCGGAAGAGCGT 743252 AGATCGGAAGAGCGTC 801139 AGATCGGAAGAGCGTCG 907952 AGATCGGAAGAGCGTCGT 938771 AGATCGGAAGAGCGTCGTG 1015754 AGATCGGAAGAGCGTCGTG 942142 AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAG 707448 AGATCGGAAGAGCGTCGTGTAG 634890 AGATCGGAAGAGCGTCCTGTAGGGAA 591900 AGATCGGAAGAGCGTCCTTAGGGAA 591900 AGATCGGAAGAGCGTCCTTAGGGAAA 591900 AGATCGGAAGAGCGTCCTTAGGGAAAGA 797993 AGATCGGAAGAGCGTCCTGTGAGGAAAGA 797993 AGATCGGAAGAGCGTCCTGTGTGAGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTGTGAGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTTGAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTTAATGGGAAAGAGTG 69362 AGATCGGAAGAGCGTCGTGTTAAGGGAAAGAGTGTTAATGGC 660536 AGATCCGGAAGAGCGT	AGATCGGAA	1282451
AGATCGGAAGAG AGATCGGAAGAGC AGATCGGAAGAGC AGATCGGAAGAGCC AGATCGGAAGAGCCT AGATCGGAAGAGCCT AGATCGGAAGAGCCT AGATCGGAAGAGCCT AGATCGGAAGAGCCTC AGATCGGAAGAGCCTC AGATCGGAAGAGCCTC AGATCGGAAGAGCCTCG AGATCGGAAGAGCCTCGT AGATCGGAAGAGCCTCGT AGATCGGAAGAGCCTCGT AGATCGGAAGAGCCTCGT AGATCGGAAGAGCCTCGT AGATCGGAAGAGCCTCGTGTAGGGAAGAGGTGTTAATGGCAAGGTG AGATCGGAAGAGCCTCGTGTAGGGAAGAGCCTTCGTTAGGGAAGAGCCTTCGTTAGGGAAGAGCCTCGTGTAGGGAAGAGGTGTTAATGGCAAGAGCCTCGTGTAGGGAAGAGCCTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAGAGGTGTTAATGGCAAGAGCGTCGTGTAGGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGGTGAAGAGCCTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGCAGGGTGAAGAGCCTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAAGGCAAGAGTGTTAATGGCAAGGTGCTAAGGCAAGAGTGTTAATGGCAAGGTGTAATGGCAAGGTGTTAATGGCAAGGTG	AGATCGGAAG	1277788
AGATCGGAAGAGC 915860 AGATCGGAAGAGCG 823785 AGATCGGAAGAGCGT 743252 AGATCGGAAGAGCGTCG 801139 AGATCGGAAGAGCGTCG 907952 AGATCGGAAGAGCGTCGT 938771 AGATCGGAAGACCGTCGTG 1015754 AGATCGGAAGACCGTCGTGT 942142 AGATCGGAAGACCGTCGTGTA 798964 AGATCGGAAGACCGTCGTGTAG 707448 AGATCGGAAGACCGTCGTGTAGG 634890 AGATCGGAAGACCGTCGTGTAGGG 581540 AGATCGGAAGACCGTCGTGTAGGGAAA 591900 AGATCGGAAGACCGTCGTGTAGGGAAAG 688619 AGATCGGAAGACCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGACCGTCGTGTAGGGAAAGAGG 839415 AGATCGGAAGACCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGACCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGACCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGACCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGACCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGACCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGA	1195126
AGATCGGAAGAGCG 823785 AGATCGGAAGAGCGT 743252 AGATCGGAAGAGCGTC 801139 AGATCGGAAGAGCGTCG 907952 AGATCGGAAGAGCGTCGT 938771 AGATCGGAAGAGCGTCGTG 1015754 AGATCGGAAGAGCGTCGTGT 942142 AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAG 707448 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGGG 581540 AGATCGGAAGAGCGTCGTGTAGGGAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAG 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCCTCGTGTAGGGAAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCCTCGTGTAGGGAAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGCTCGTGTAGGGAAAAGAGTGTTAATGGCA 615146	AGATCGGAAGAG	1065882
AGATCGGAAGAGCGT 743252 AGATCGGAAGAGCGTC 801139 AGATCGGAAGAGCGTCG 907952 AGATCGGAAGAGCGTCGT 938771 AGATCGGAAGAGCGTCGTG 1015754 AGATCGGAAGAGCGTCGTGT 942142 AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAG 707448 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGGG 581540 AGATCGGAAGAGCGTCGTGTAGGGAAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAG 688619 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTGAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTGAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCCTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCCTGTAGGGAAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCCTGTAGGGAAAAGAGTGTTAATGGCA 615146	AGATCGGAAGAGC	915860
AGATCGGAAGAGCGTC 801139 AGATCGGAAGAGCGTCG 907952 AGATCGGAAGAGCGTCGT 938771 AGATCGGAAGAGCGTCGTG 1015754 AGATCGGAAGAGCGTCGTGT 942142 AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGGGAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTTAATGGC 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 660536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCG	823785
AGATCGGAAGAGCGTCG 907952 AGATCGGAAGAGCGTCGT 938771 AGATCGGAAGAGCGTCGTG 1015754 AGATCGGAAGAGCGTCGTGT 942142 AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAG 707448 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGGG 581540 AGATCGGAAGAGCGTCGTGTAGGGAAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAG 688619 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 666536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGT	743252
AGATCGGAAGAGCGTCGT 938771 AGATCGGAAGAGCGTCGTG 1015754 AGATCGGAAGAGCGTCGTGT 942142 AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAG 707448 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGGG 581540 AGATCGGAAGAGCGTCGTGTAGGGAAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAG 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTC	801139
AGATCGGAAGAGCGTCGTG 1015754 AGATCGGAAGACCGTCGTGT 942142 AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAG 707448 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGGG 581540 AGATCGGAAGAGCGTCGTGTAGGGAAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAG 688619 AGATCGGAAGACCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGACCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGACGCTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGACGCTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCG	907952
AGATCGGAAGAGCGTCGTGT 942142 AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAG 707448 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGGG 581540 AGATCGGAAGAGCGTCGTGTAGGGAAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAG 688619 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGACGCTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCGT	938771
AGATCGGAAGAGCGTCGTGTA 798964 AGATCGGAAGAGCGTCGTGTAG 707448 AGATCGGAAGAGCGTCGTGTAGG 634890 AGATCGGAAGAGCGTCGTGTAGGG 581540 AGATCGGAAGAGCGTCGTGTAGGGAAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAG 688619 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCGTG	1015754
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AGATCGGAAGAGCGTCGTGTAGGG 634890 AGATCGGAAGAGCGTCGTGTAGGG 581540 AGATCGGAAGAGCGTCGTGTAGGGAAA 591900 AGATCGGAAGAGCGTCGTGTAGGGAAAG 688619 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG 643010 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCGTGTA	798964
AGATCGGAAGAGCGTCGTGTAGGG AGATCGGAAGAGCGTCGTGTAGGGAAA S91900 AGATCGGAAGAGCGTCGTGTAGGGAAAG AGATCGGAAGAGCGTCGTGTAGGGAAAG AGATCGGAAGAGCGTCGTGTAGGGAAAGA 797993 AGATCGGAAGAGCGTCGTGTAGGGAAAGA 839415 AGATCGGAAGAGCGTCGTGTAGGGAAAGAG 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGGCGTCGTGTAGGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGGCGTCGTGTAGGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGGCGTCGTGAGGGAAAGAGGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGGTGTTAATGGCAAGGTG	AGATCGGAAGAGCGTCGTGTAG	707448
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AGATCGGAAGAGCGTCGTGTAGGGAAAGA AGATCGGAAGAGCGTCGTGTAGGGAAAGA AGATCGGAAGAGCGTCGTGTAGGGAAAGAG AGATCGGAAGAGCGTCGTGTAGGGAAAGAG AGATCGGAAGAGCGTCGTGTAGGGAAAGAG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA	AGATCGGAAGAGCGTCGTGTAGGG	581540
AGATCGGAAGAGCGTCGTGTAGGGAAAGA AGATCGGAAGAGCGTCGTGTAGGGAAAGAG AGATCGGAAGAGCGTCGTGTAGGGAAAGAG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT 776027 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGGTGTTAATGGCAAGGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGGTGTTAATGGCAAGGTG	AGATCGGAAGAGCGTCGTGTAGGGAAA	591900
AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG	AGATCGGAAGAGCGTCGTGTAGGGAAAG	688619
AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCGTGTAGGGAAAGA	797993
AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGT AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG 593462 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC 660536 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 615146 AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA 807019	AGATCGGAAGAGCGTCGTGTAGGGAAAGAG	839415
AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCGTGTAGGGAAAGAGT	776027
AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTG	643010
AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG	593462
AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG 807019	AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC	660536
	AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA	615146
other adapter sequences 26585580	AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG	807019
	other adapter sequences	26585580

Duplication

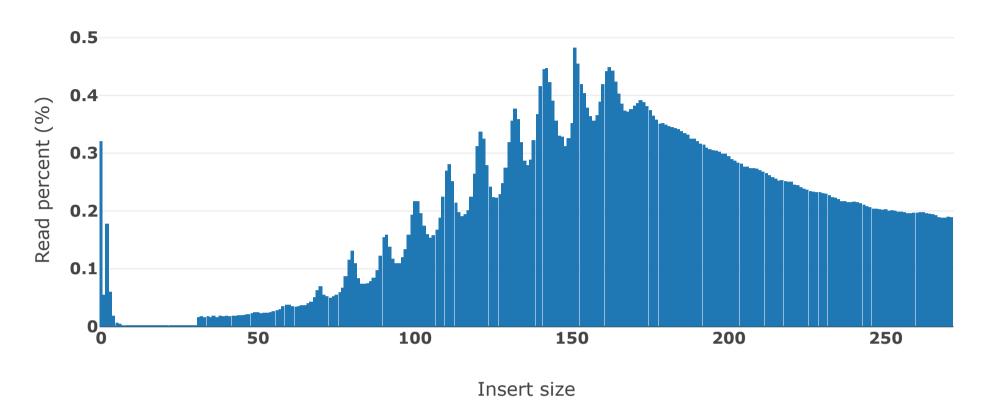
duplication rate (3.224185%)



duplication level

Insert size estimation

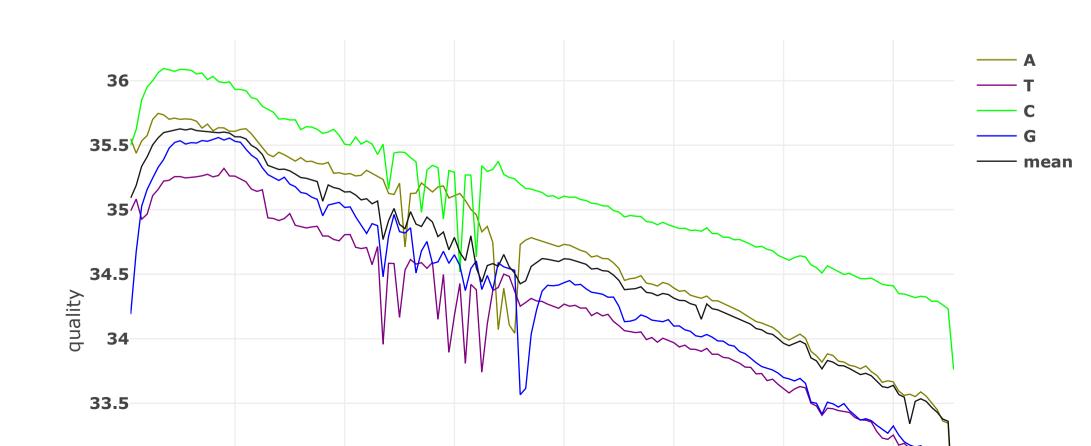
Insert size distribution (46.814367% reads are with unknown length)

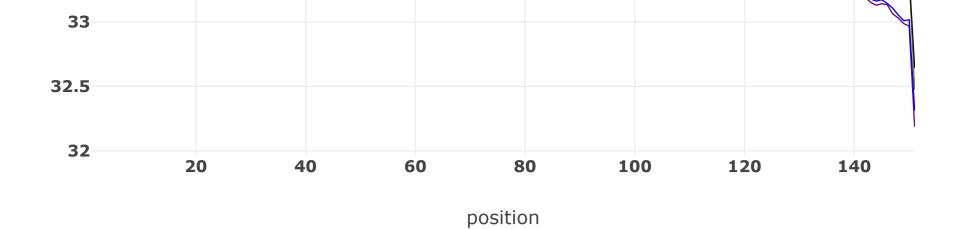


This estimation is based on paired—end overlap analysis, and there are 46.814367% reads found not overlapped. The nonoverlapped read pairs may have insert size <30 or >272, or contain too much sequencing errors to be detected as overlapped.

Before filtering

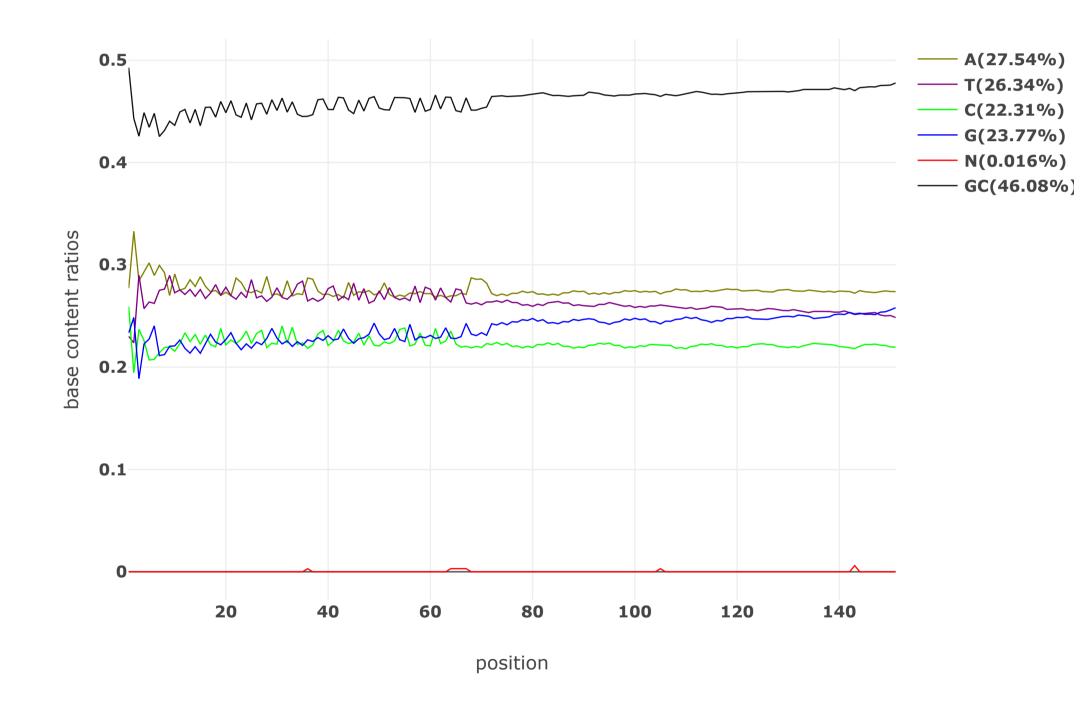
Before filtering: read1: quality





Before filtering: read1: base contents

Value of each position will be shown on mouse over.



Before filtering: read1: KMER counting

Darker background means larger counts. The count will be shown on mouse over.

	AA	AT	AC	AG	TA	TT	TC	TG	CA	CT	CC	CG	GA	GT	GC	GG
AAA	AAAAA	AAAAT	AAAAC	AAAAG	AAATA	AAATT	AAATC	AAATG	AAACA	AAACT	AAACC	AAACG	AAAGA	AAAGT	AAAGC	AAAGG
AAT	AATAA	AATAT	AATAC	AATAG	AATTA	AATTT	AATTC	AATTG	AATCA	AATCT	AATCC	AATCG	AATGA	AATGT	AATGC	AATGG
AAC	AACAA	AACAT	AACAC	AACAG	AACTA	AACTT	AACTC	AACTG	AACCA	AACCT	AACCC	AACCG	AACGA	AACGT	AACGC	AACGG
AAG	AAGAA	AAGAT	AAGAC	AAGAG	AAGTA	AAGTT	AAGTC	AAGTG	AAGCA	AAGCT	AAGCC	AAGCG	AAGGA	AAGGT	AAGGC	AAGGG
ATA	ATAAA	ATAAT	ATAAC	ATAAG	ATATA	ATATT	ATATC	ATATG	ATACA	ATACT	ATACC	ATACG	ATAGA	ATAGT	ATAGC	ATAGG
ATT	ATTAA	ATTAT	ATTAC	ATTAG	ATTTA	ATTTT	ATTTC	ATTTG	ATTCA	ATTCT	ATTCC	ATTCG	ATTGA	ATTGT	ATTGC	ATTGG
ATC	ATCAA	ATCAT	ATCAC	ATCAG	ATCTA	ATCTT	ATCTC	ATCTG	ATCCA	ATCCT	ATCCC	ATCCG	ATCGA	ATCGT	ATCGC	ATCGG
ATG	ATGAA	ATGAT	ATGAC	ATGAG	ATGTA	ATGTT	ATGTC	ATGTG	ATGCA	ATGCT	ATGCC	ATGCG	ATGGA	ATGGT	ATGGC	ATGGG
ACA	ACAAA	ACAAT	ACAAC	ACAAG	ACATA	ACATT	ACATC	ACATG	ACACA	ACACT	ACACC	ACACG	ACAGA	ACAGT	ACAGC	ACAGG
ACT	ACTAA	ACTAT	ACTAC	ACTAG	ACTTA	ACTTT	ACTTC	ACTTG	ACTCA	ACTCT	ACTCC	ACTCG	ACTGA	ACTGT	ACTGC	ACTGG
ACC	ACCAA	ACCAT	ACCAC	ACCAG	ACCTA	ACCTT	ACCTC	ACCTG	ACCCA	ACCCT	ACCCC	ACCCG	ACCGA	ACCGT	ACCGC	ACCGG
ACG	ACGAA	ACGAT	ACGAC	ACGAG	ACGTA	ACGTT	ACGTC	ACGTG	ACGCA	ACGCT	ACGCC	ACGCG	ACGGA	ACGGT	ACGGC	ACGGG

AGT AGEAA ASCAL ACCAL AC	AGA	AGAAA	AGAAT	AGAAC	AGAAG	AGATA	AGATT	AGATC	AGATG	AGACA	AGACT	AGACC	AGACG	AGAGA	AGAGT	AGAGC	AGAGG
AGGA AGGAL AGGAL AGGAL AGGAL AGGAL AGGAL AGGTL AGGTL AGGTL AGGCL AGGCL AGGC AGGGA AGGGL AGGGA AGGAL A	AGT	AGTAA	AGTAT	AGTAC	AGTAG	AGTTA	AGTTT	AGTTC	AGTTG	AGTCA	AGTCT	AGTCC	AGTCG	AGTGA	AGTGT	AGTGC	AGTGG
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TAM TAMAN TAMAT TAMAC TAMAT TAMTC TAMAC TAMAC TAMAC TAMACC TAM	AGG	AGGAA	AGGAT	AGGAC	AGGAG	AGGTA	AGGTT	AGGTC	AGGTG	AGGCA	AGGCT	AGGCC	AGGCG	AGGGA	AGGGT	AGGGC	AGGGG
TAT 1747AB TATAT TATAC TATAG TATAT TATAT TATTC TATTC TATCA TATCT TATCC TATCC TATCC TATCC TATCC TATACT TATCT TATCT TATCT TATCT TATCC TATCC TACCA																	
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TGC TGCAD CCADG C																	
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CGA CGAAA CGAAT CGAAC CGAAG CGATA CGATT CGATC CGATG CGACA CGACT CGACC CGACG CGACG CGAGA CGACT CGACG CGT CGT CGT CGT CGT CGT CGT CGT CGT C																	
CGT CGTAA CGTAT CGTAC CGTAG CGTTA CGTTT CGTTC CGTTG CGTCA CGTCT CGTCC CGTCG CGTGA CGTGT CGTGC CGTCG CGCC CGCC																	
CGC CGCAA CGCAT CGCAC CGCAG CGCTA CGCTT CGCTC CGCTG CGCCA CGCCT CGCCC CGCCG CGCGA CGCGT CGCGC CGCGG CGGA CGGA								†		-							
CGG CGGAA CGGAT CGGAC CGGAG CGGTA CGGTT CGGTC CGGTC CGGCA CGGCT CGGCC CGGCG CGGGA CGGGT CGGGC CGGGG GAAAA CAAAA CAAAA GAAAT GAAAC GAAAG GAATA GAATT GAATC GAATC GAACA GAACA GAACT GAACC GAACA GA																	
GAA GAAAA GAAAT GAAAC GAAAG GAATA GAATT GAATC GAATG GAACA GAACT GAACC GAACG GAAGA GAAGT GAAGC GAAGG GATG GAT																	
GAT GATAA GATAT GATAC GATAG GATTA GATTT GATTC GATTG GATCA GATCT GATCC GATCG GATCG GATCG GATGA GATGT GATGC GATGG GAC GACAA GACAT GACAC GACAG GACTA GACTT GACTC GACTG GACCA GACCT GACCC GACCG GACGA GACGT GACGC GACGG GAG GAGAA GAGAT GAGAC GAGAG GACTA GACTT GACTC GACTG GACCA GACCT GACCC GACCG GACGA GACGT GACGC GAGGG GTA GTAAA GTAAT GTAAC GTAAG GATAT GTATT GTATC GATTG GTACA GTACT GACCC GAGCG GAGGA GAGGT GAGGC GAGGG GTT GTTAA GTTAT GTACC GTAGG GTTTA GTTTT GTATC GTTTG GTTCA GTTCT GTTCC GTTCG GTTGA GTTGA GTTGT GTAGC GTAGG GTC GTCAA GTCAT GTCAC GTCAG GTCTA GTCTT GTCTC GTCCC GTCCG GTCGA GTCGT GTCGC GTCGG GCA GCAAA GCAAT GCAAC GCAAG GCATA GCATT GCATC GCATC GCACC GCACC GCACG GCAGA GCAGT GCAGC GCC GCCAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCTCC GCCCC GCCCG GCCGA GCCGT GCCGC GCCG GCCAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCG GCCGA GCCGT GCCGC GCGG GCGAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCG GCCGA GCCGT GCCGC GCGG GCGAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCG GCCGA GCCGT GCCGC GCGG GCGAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCG GCCGA GCCGT GCCGC GCGG GCGAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCG GCCGA GCCGT GCCGC GCGG GCGAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCC GCCCG GCCGA GCCGT GCCCC GCCG GCGAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCC GCCCG GCCGA GCCGT GCCCC GCCG GCGAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCC GCCCG GCCGA GCCGT GCCCC GCCG GCGAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCC GCCCC GCCCG GCCGA GCCGT GCCCC GCCG GCGAA GCCAT GCCAC GCCAG GCCAT GCCTT GCCTC GCCTC GCCCC GCCCC GCCCG GCCGA GCCGT GCCCC GCCG GCCAA GCCAT GCCAC GCCAA GCCAT GCCCC GCC																	
GAC GACAA GACAT GACAC GACAG GACTA GACTT GACTC GACTG GACCA GACCT GACCG GACGA GACGT GACGC GAGGG GAGGA GAGGT GACGC GAGG GAGG												-					
GAG GAGAA GAGAT GAGAC GAGAG GAGTA GAGTT GAGTC GAGTG GAGCA GAGCT GAGCC GAGCG GAGCA GAGGT GAGGC GAGGG GTA GTAAA GTAAT GTAAC GTAAG GTATA GTATT GTATC GTATG GTACA GTACT GTACC GTACG GTAGA GTAGA GTAGT GTAGC GTT GTTAA GTTAT GTAC GTAG GTTTA GTTTC GTTTC GTTTC GTTCC GTTCG GTCCA GT																	
GTA GTAAA GTAAT GTAAC GTAAG GTATA GTATT GTATC GTATG GTACA GTACT GTACC GTACG GTAGA GTAGT GTAGC GTAGG GTT GTTAA GTTAT GTTAC GTTAG GTTTA GTTTT GTTTC GTTTC GTTCA GTTCT GTCC GTTCG GTTCG GTTCG GTTCG GTC GTCAA GTCAT GTCAC GTCAG GTCTA GTCTT GTCTC GTCC GTC																	
GTT GTTAA GTTAT GTTAC GTTAG GTTTA GTTTT GTTTC GTTTG GTTCA GTTCT GTTCC GTTCG GTCAC GT																	
GTC GTCAA GTCAT GTCAC GTCAG GTCTA GTCTT GTCTC GTCTG GTCCA GTCCT GTCCC GTCCG GTCGA GTCGT GTCGC GTCGG GTG GTGAA GTGAT GTGAC GTGAG GTGTA GTGTT GTGTC GTGTC GTGAA GCAAA GCAAT GCAAC GCAAG GCATA GCATT GCATC GCATG GCACA GCACT GCACC GCACG GCAGA GCAGT GCAGC GCT GCTAA GCTAT GCTAC GCTAG GCTTA GCTTT GCTTC GCTTC GCTCA GCTCT GCCCC GCCCG GCCGA GCCGT GCCGC GCC GCCAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTG GCCCA GCCCT GCCCC GCCGG GCCGA GCCGT GCCGC GCG GCGAA GCGAT GCGAC GCGAG GCGTA GCGTT GCGTC GCGTC GCCCA GCCCT GCCCC GCCGG GCGGA GCCGT GCGGC GCG GCGAA GCGAT GCGAC GCGAG GCGTA GCGTT GCGTC GCGTC GCGCA GCCCT GCCCC GCGGA GCGGT GCGGC GCGA GGAAA GGAAT GGAAC GGAAG GGATA GGATT GGATC GGATC GGACA GGACT GGACC GGAGA GGAGT GGAGC GGT GGTAA GGTAT GGTAC GGTAG GGTTA GGTTC GGTCC GGTTG GGCCC GGCCG GGCGA GGGTG GGAGC GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGTTA GGTTC GGTCC GGTCG GGCCC GGCCG GGCGA GGCGT GGGCC GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGTTA GGTTC GGTCC GGTCA GGCCC GGCCG GGCGA GGCGT GGGCC GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGTTA GGTTC GGTCC GGTCA GGCCC GGCCG GGCGA GGCGT GGGCC GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGTTA GGTTC GGTCC GGCCC GGCCC GGCCG GGCGA GGCGT GGGCC GGC GGCAA GGCAT GGCAC GGCAA GGCAT GGCCC GGCCG GGCGA GGCGT GGCCC GGCGC GGC GGCAA GGCAT GGCAC GGCAA GGCTT GGCCC GGCCG GGCGA GGCGT GGCCC GGCGC																	
GTG GTGAA GTGAT GTGAC GTGAG GTGTA GTGTT GTGTC GTGTG GTGCA GTGCT GTGCC GTGCG GTGGA GTGGT GTGGC GTGGG GCA GCAAA GCAAT GCAAC GCAAG GCATA GCATT GCATC GCATG GCACA GCACT GCACC GCACG GCAGA GCAGT GCAGC GCAGG GCT GCTAA GCTAT GCTAC GCTAG GCTTA GCTTT GCTTC GCTTC GCTCA GCTCT GCCCC GCCCG GCCGA GCCGT GCCGC GCC GCCAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCA GCCCT GCCCC GCCCG GCCGA GCCGT GCCGC GCG GCGAA GCGAT GCGAC GCGAG GCGTA GCGTT GCGTC GCGTC GCGCA GCCCT GCCCC GCGCG GCGGA GCGGT GCGGC GCG GCGAA GCGAT GCGAC GCGAG GCGTA GCGTT GCGTC GCGTC GCGCA GCGCT GCGCC GCGGA GCGGT GCGGC GGA GGAAA GGAAT GGAAC GGAAG GGATA GGATT GGATC GGATC GGACA GGACT GGACC GGACG GGAGA GGAGT GGAGC GGT GGTAA GGTAT GGTAC GGTAG GGTTA GGTTC GGTCC GGTCG GGCCA GCCCT GCCCC GGCCG GGCGA GGGGT GGGCC GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGTTA GGTTC GGTCC GGTCA GGCCC GGCCG GGCGA GGCGT GGCGC GGGGG GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGCTT GGCTC GGCCC GGCCC GGCCG GGCGA GGCGT GGCGC GGGGG GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGCTT GGCTC GGCCC GGCCC GGCCG GGCGA GGCGT GGCGC GGCGG GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGCTT GGCTC GGCCC GGCCC GGCCG GGCGA GGCGT GGCGC GGCGG GGC GGCAA GGCAT GGCAC GGCAA GGCTT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGG GGC GGCAA GGCAT GGCAC GGCAA GGCTT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGG													-				
GCA GCAAA GCAAT GCAAC GCAAG GCATA GCATT GCATC GCATG GCACA GCACT GCACC GCACG GCAGA GCAGT GCAGC GCAGG GCTGA GCTT GCTC GCTC																	
GCT GCTAA GCTAT GCTAC GCTAG GCTTA GCTTT GCTTC GCTTG GCTCA GCTCT GCTCC GCTCG GCTCG GCTCA GCTCT GCTCC GCTCG GCC GCCAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTG GCCCA GCCCT GCCCC GCCCG GCCCG GCCCG GCCGC GCCG GCCAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTC GCCCA GCCCT GCCCC GCCCG GCCCG GCCGA GCCGT GCCGC GCG GCGAA GCGAT GCGAC GCGAG GCGTA GCGTT GCGTC GCGTC GCGCA GCGCT GCGCC GCGCG GCGGA GCGGT GCGCC GGA GGAAA GGAAT GGAAC GGAAG GGATA GGATT GGATC GGATC GGACA GGACT GGACC GGACG GGAGA GGAGT GGAGC GGT GGTAA GGTAT GGTAC GGTAG GGTTA GGTTT GGTTC GGTTC GGTCA GGTCT GGCCC GGCCG GGCGA GCGGT GGCGC GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGCTT GGCTC GGCCA GGCCT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGG																	
GCC GCCAA GCCAT GCCAC GCCAG GCCTA GCCTT GCCTC GCCTG GCCCA GCCCT GCCCC GCCCG GCCGA GCCGT GCCGC GCCGG GCG GCGAA GCGAT GCGAC GCGAG GCGTA GCGTT GCGTC GCGTG GCGCA GCGCT GCGCC GCGCG GCGGA GCGGT GCGGC GGA GGAAA GGAAT GGAAC GGAAG GGATA GGATT GGATC GGATG GGACA GGACT GGACC GGACG GGAGA GGAGT GGAGC GGT GGTAA GGTAT GGTAC GGTAG GGTTA GGTTT GGTTC GGTTC GGTCA GGCCT GGCCC GGCGG GGCGA GGGGT GGGGC GGC GGCAA GGCAT GGCAC GGCAG GGCAA GGCAT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGA GGCAA GGCAT GGCAC GGCAG GGCAA GGCCT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGA GGCAA GGCAT GGCAC GGCAA GGCAT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGG																	
GCG GCGAA GCGAT GCGAC GCGAG GCGTA GCGTT GCGTC GCGTG GCGCA GCGCT GCGCC GCGCG GCGGA GCGGT GCGGC GCGGG GGA GGAAA GGAAT GGAAC GGAAG GGATA GGATT GGATC GGATG GGACA GGACT GGACC GGACG GGAGA GGAGT GGAGC GGAGG GGT GGTAA GGTAT GGTAC GGTAG GGTTA GGTTT GGTTC GGTTC GGTCA GGTCT GGCCC GGCGA GGCGA GGCGT GGCGC GGC GGCAA GGCAT GGCAC GGCAG GGCAA GGCTT GGCCC GGCCG GGCGA GGCGT GGCGC																	
GGA GGAAA GGAAT GGAAC GGAAG GGATA GGATT GGATC GGATG GGACA GGACT GGACC GGACG GGAGA GGAGT GGAGC GGAGG GGT GGTAA GGTAT GGTAC GGTAG GGTTA GGTTT GGTTC GGTTG GGTCA GGTCT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGC GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGCTT GGCTC GGCCA GGCCT GGCCC GGCCG GGCGA GGCGT GGCGC																	
GGT GGTAA GGTAT GGTAC GGTAG GGTTA GGTTT GGTTC GGTTG GGTCA GGTCT GGTCC GGTCG GGTGA GGTGT GGTGC GGTGG GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGCTT GGCTC GGCTG GGCCA GGCCT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGG																	
GGC GGCAA GGCAT GGCAC GGCAG GGCTA GGCTT GGCTC GGCTG GGCCA GGCCT GGCCC GGCCG GGCGA GGCGT GGCGC GGCGG																	
333 300AA 300AA 300AC 300AO 300AA 300AA 300AC 300AC 300CA 300CC 300CC 300CC 300CC 300CC 300CC																	
	300	- OOOAA	- OOOAT	T-000AC	T-000A0		- 00011	_ 0001C	- 00010	I GOOCH	- 00001	- 00000	- 00000	- GOOGA	0000T		00000

Before filtering: read1: overrepresented sequences

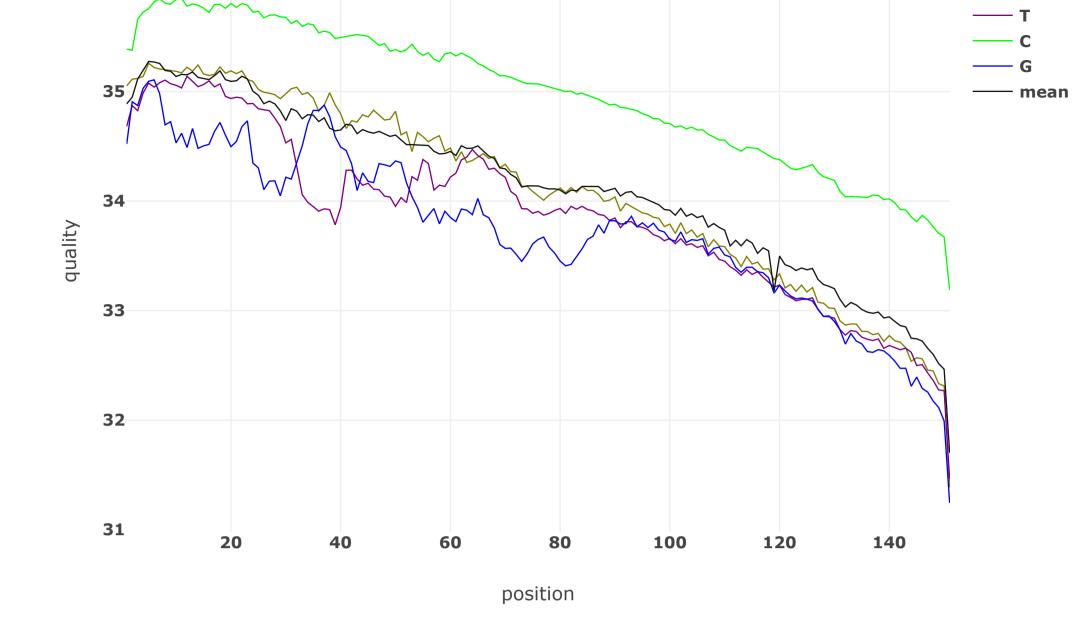
Sampling rate: 1 / 20

overrepresented sequence	count (% of bases)	distribution: cycle 1 ~ cycle 151
АААААААА	196364 (0.082971%)	
AACACACACACACACACACACACACACACACACA	39015 (0.065941%)	
AAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAAC	30455 (0.051473%)	
ACAAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTA	32048 (0.054166%)	
ACACACACACACACACACACACACACACACACACA	1432 (0.002420%)	
AC	35817 (0.060536%)	
ACACACACACACACACACACACACACACACACACACAC	837 (0.003537%)	
ACACACACACACACACACACACACACACACACACACACAG	1006 (0.001700%)	
ACAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	49438 (0.083557%)	
AG	15042 (0.025423%)	
AGAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	47750 (0.080704%)	
AGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACC	297 (0.000502%)	
AGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCTTCGATCTCGTATGCCGTCTTCTGCTTGAAA AGGGGGGGGGG	6492 (0.027431%)	
AGGAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTA	26694 (0.045117%)	

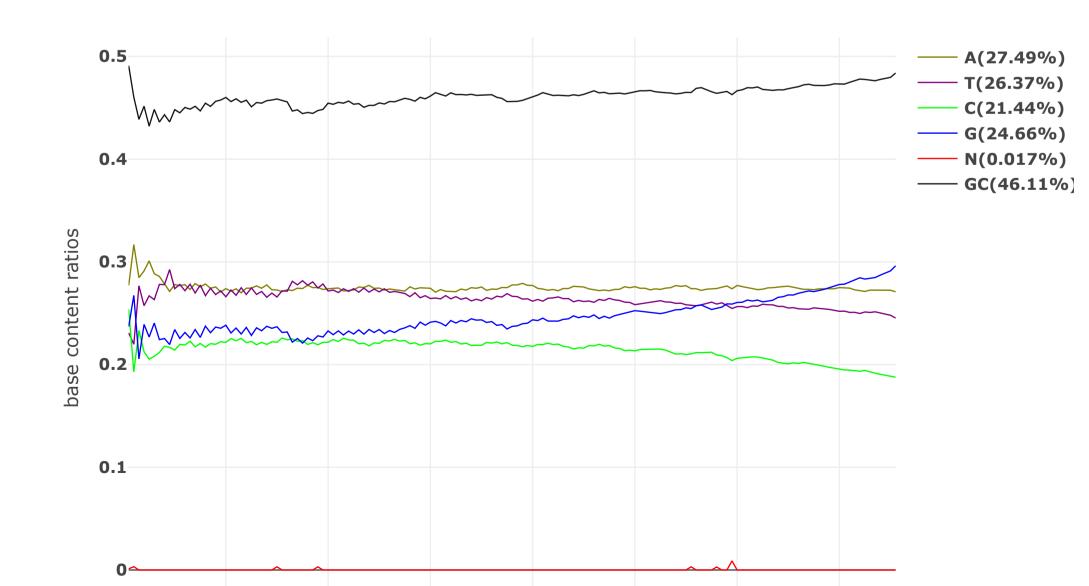
ATAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	43281 (0.073151%)	
ATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCTTCGATCGCGTATGCCGTCTTCTGCTTGAAAAGGGGGGGG	38 (0.000239%)	
ATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCTTCGATCTCGTATGCCGTCTTCTGCTTGAAAAG GGGGGGGGGG	165 (0.001039%)	
ATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCTTCGATCTCGTATGCCGTCTTCTGCTTGAAAAT GGGGGGGGGG	42 (0.000264%)	
ATCTCGTATGCCGTCTTCTGCGTGAAAAGGGGGGGGGGG	7 (0.000030%)	
ATGCCGTCTTCTGCGTGAAAAGGGGGGGGGGGGGGGGGG	297 (0.001255%)	
ATGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	35359 (0.059762%)	
CAAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	44723 (0.075588%)	
CACACACACACACACACACACACACACACACAAA	2579 (0.004359%)	
CACACACACACACACACACACACACACACACACACACA	35227 (0.059539%)	
CACACACACACACACACACACACACACACACACACACA	1097 (0.004635%)	
CACACACACACACACACACACACACACACACACACAC	700 (0.001183%)	
CAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAAC	33 (0.000056%)	
CCAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	58292 (0.098522%)	
CGAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	39784 (0.067241%)	
CGTATGCCGTCTTCTGCGTGAAAAGGGGGGGGGGGGGGG	2816 (0.011899%)	
CTAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	36161 (0.061117%)	
CTCGTATGCCGTCTTCTGCGTGAAAAGGGGGGGGGGGGG	12 (0.000051%)	
стстстстстстстстстстстстстстстст	8487 (0.014344%)	
CTTCGATCTCGTATGCCGTCTTCTGCGTGAAAAGGGGGGGG	6005 (0.025373%)	
GAAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	31593 (0.053397%)	
GA	13545 (0.022893%)	
GAGATCGGAAGACCACGTCTGAACTCCAGTCACTTAAC	66 (0.000112%)	
GATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCT	200478 (0.338837%)	
GATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCTTCGATCGCGTATGCCGTCTTCTGCTTGAAAA GGGGGGGGGG	17397 (0.109528%)	
GATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCTTCGATCTCGTATGCCGTCTTCTGCTTGAAAA GGGGGGGGGG	70011 (0.440774%)	
GATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAACCTTCGATCTCGTATGCCGTCTTCTGCTTGAAAA TGGGGGGGGGG	9153 (0.057625%)	
GCACACACACACACACACACACACACACACACACACACA	45650 (0.077155%)	
GCAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	42275 (0.071451%)	
GGAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	33696 (0.056951%)	
GGGAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTA	31575 (0.053366%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	456173 (0.770998%)	

GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	17906 (0.075659%)	
GTAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	24887 (0.042063%)	
GTATGCCGTCTTCTGCGTGAAAAGGGGGGGGGGGGGGGG	38 (0.000161%)	
GTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	17443 (0.073703%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTGTG	2295 (0.003879%)	
GT	67591 (0.114238%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	349 (0.001475%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTTTT	1054 (0.001781%)	
TAAGATCGGAAGACCACGTCTGAACTCCAGTCACTTAA	46209 (0.078100%)	
TACACACACACACACACACACACACACACACACACACAC	34986 (0.059131%)	
TAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAAC	66 (0.000112%)	
TCACACACACACACACACACACACACACACACACAC	31986 (0.054061%)	
TCAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	52466 (0.088675%)	
TCGATCTCGTATGCCGTCTTCTGCGTGAAAAGGGGGGGGG	13 (0.000055%)	
TCTAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTA	17975 (0.030380%)	
TCTCGTATGCCGTCTTCTGCGTGAAAAGGGGGGGGGGGG	5 (0.000021%)	
тстстстстстстстстстстстстстстстс	10024 (0.016942%)	
TGAGATCGGAAGACCACGTCTGAACTCCAGTCACTTAA	64361 (0.108779%)	
TGCCGTCTTCTGCTTGAAAAGGGGGGGGGGGGGGGGGGG	2210 (0.009338%)	
TGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	23224 (0.098130%)	
TGTAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTA	20609 (0.034832%)	
TGTGTGTGTGTGTGTGTGTGTGTGTGTGAG	2543 (0.004298%)	
тстстстстстстстстстстстстстстс	47868 (0.080904%)	
TGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTG	515 (0.002176%)	
тстстстстстстстстстстстстстстст	1135 (0.001918%)	
TTAGATCGGAAGAGCACACGTCTGAACTCCAGTCACTTAA	41148 (0.069546%)	
TTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	29671 (0.050148%)	
TTTAGATCGGAAGACCACGTCTGAACTCCAGTCACTTA	24687 (0.041725%)	

Before filtering: read2: quality



Before filtering: read2: base contents



20 40 60 80 100 120 140

position

Before filtering: read2: KMER counting

Darker background means larger counts. The count will be shown on mouse over.

AA	AA AAAAA	AT AAAAT	AC AAAAC	AG AAAAG	TA AAATA	AAATT	TC AAATC	TG AAATG	CA AAACA	CT AAACT	AAACC	CG AAACG	GA AAAGA	GT AAAGT	GC AAAGC	GG AAAG
\T	AATAA	AATAT	AATAC	AATAG	AATTA	AATTT	AATTC	AATTG	AATCA	AATCT	AATCC	AATCG	AATGA	AATGT	AATGC	AAAG
VC	AACAA	AACAT	AACAC	AACAG	AACTA	AACTT	AACTC	AACTG	AACCA	AACCT	AACCC	AACCG	AACGA	AACGT	AACGC	AACG
١Ğ	AAGAA	AAGAT	AAGAC	AAGAG	AAGTA	AAGTT	AAGTC	AAGTG	AAGCA	AAGCT	AAGCC	AAGCG	AAGGA	AAGGT	AAGGC	AAGG
ГА	ATAAA	ATAAT	ATAAC	ATAAG	ATATA	ATATT	ATATC	ATATG	ATACA	ATACT	ATACC	ATACG	ATAGA	ATAGT	ATAGC	ATAC
Т	ATTAA	ATTAT	ATTAC	ATTAG	ATTTA	ATTTT	ATTTC	ATTTG	ATTCA	ATTCT	ATTCC	ATTCG	ATTGA	ATTGT	ATTGC	ATTO
ГС	ATCAA	ATCAT	ATCAC	ATCAG	ATCTA	ATCTT	ATCTC	ATCTG	ATCCA	ATCCT	ATCCC	ATCCG	ATCGA	ATCGT	ATCGC	ATCO
rg i	ATGAA	ATGAT	ATGAC	ATGAG	ATGTA	ATGTT	ATGTC	ATGTG	ATGCA	ATGCT	ATGCC	ATGCG	ATGGA	ATGGT	ATGGC	ATGO
CA I	ACAAA	ACAAT	ACAAC	ACAAG	ACATA	ACATT	ACATC	ACATG	ACACA	ACACT	ACACC	ACACG	ACAGA	ACAGT	ACAGC	ACAC
T	ACTAA	ACTAT	ACTAC	ACTAG	ACTTA	ACTTT	ACTTC	ACTTG	ACTCA	ACTCT	ACTCC	ACTCG	ACTGA	ACTGT	ACTGC	ACTO
CC	ACCAA	ACCAT	ACCAC	ACCAG	ACCTA	ACCTT	ACCTC	ACCTG	ACCCA	ACCCT	ACCCC	ACCCG	ACCGA	ACCGT	ACCGC	ACC
CG	ACGAA	ACGAT	ACGAC	ACGAG	ACGTA	ACGTT	ACGTC	ACGTG	ACGCA	ACGCT	ACGCC	ACGCG	ACGGA	ACGGT	ACGGC	ACG
βA	AGAAA	AGAAT	AGAAC	AGAAG	AGATA	AGATT	AGATC	AGATG	AGACA	AGACT	AGACC	AGACG	AGAGA	AGAGT	AGAGC	AGA
T	AGTAA	AGTAT	AGTAC	AGTAG	AGTTA	AGTTT	AGTTC	AGTTG	AGTCA	AGTCT	AGTCC	AGTCG	AGTGA	AGTGT	AGTGC	AGT
GC	AGCAA	AGCAT	AGCAC	AGCAG	AGCTA	AGCTT	AGCTC	AGCTG	AGCCA	AGCCT	AGCCC	AGCCG	AGCGA	AGCGT	AGCGC	AGC
G	AGGAA	AGGAT	AGGAC	AGGAG	AGGTA	AGGTT	AGGTC	AGGTG	AGGCA	AGGCT	AGGCC	AGGCG	AGGGA	AGGGT	AGGGC	AGG
AA	TAAAA	TAAAT	TAAAC	TAAAG	TAATA	TAATT	TAATC	TAATG	TAACA	TAACT	TAACC	TAACG	TAAGA	TAAGT	TAAGC	TAA
λT	TATAA	TATAT	TATAC	TATAG	TATTA	TATTT	TATTC	TATTG	TATCA	TATCT	TATCC	TATCG	TATGA	TATGT	TATGC	TAT
VC	TACAA	TACAT	TACAC	TACAG	TACTA	TACTT	TACTC	TACTG	TACCA	TACCT	TACCC	TACCG	TACGA	TACGT	TACGC	TAC
١G	TAGAA	TAGAT	TAGAC	TAGAG	TAGTA	TAGTT	TAGTC	TAGTG	TAGCA	TAGCT	TAGCC	TAGCG	TAGGA	TAGGT	TAGGC	TAG
Α	TTAAA	TTAAT	TTAAC	TTAAG	TTATA	TTATT	TTATC	TTATG	TTACA	TTACT	TTACC	TTACG	TTAGA	TTAGT	TTAGC	TTA
Т	TTTAA	TTTAT	TTTAC	TTTAG	TTTTA	TTTTT	TTTTC	TTTTG	TTTCA	TTTCT	TTTCC	TTTCG	TTTGA	TTTGT	TTTGC	TTT
C	TTCAA	TTCAT	TTCAC	TTCAG	TTCTA	TTCTT	TTCTC	TTCTG	TTCCA	TTCCT	TTCCC	TTCCG		TTCGT	TTCGC	TTC
G	TTGAA	TTGAT	TTGAC	TTGAG	TTGTA	TTGTT	TTGTC	TTGTG	TTGCA	TTGCT	TTGCC	TTGCG	TTGGA	TTGGT	TTGGC	TTG
A	TCAAA	TCAAT	TCAAC	TCAAG	TCATA	TCATT	TCATC	TCATG	TCACA	TCACT	TCACC	TCACG	TCAGA	TCAGT	TCAGC	TCA
Т	TCTAA	TCTAT	TCTAC	TCTAG	TCTTA	TCTTT	TCTTC	TCTTG	TCTCA	TCTCT	TCTCC	TCTCG	TCTGA	TCTGT	TCTGC	ТСТ
С	TCCAA	TCCAT	TCCAC	TCCAG	TCCTA	TCCTT	TCCTC	TCCTG	TCCCA	TCCCT	TCCCC	TCCCG	TCCGA	TCCGT	TCCGC	TCC
G	TCGAA	TCGAT	TCGAC	TCGAG	TCGTA	TCGTT	TCGTC	TCGTG	TCGCA	TCGCT	TCGCC	TCGCG	TCGGA	TCGGT	TCGGC	TCG
A	TGAAA	TGAAT	TGAAC	TGAAG	TGATA	TGATT	TGATC	TGATG	TGACA	TGACT	TGACC	TGACG	TGAGA	TGAGT	TGAGC	TGA
T	TGTAA	TGTAT	TGTAC	TGTAG	TGTTA	TGTTT	TGTTC	TGTTG	TGTCA	TGTCT	TGTCC	TGTCG		TGTGT	TGTGC	TGT
C	TGCAA	TGCAT	TGCAC	TGCAG	TGCTA	TGCTT	TGCTC	TGCTG	TGCCA	TGCCT	TGCCC	TGCCG	TGCGA	TGCGT	TGCGC	TGC
G	TGGAA	TGGAT	TGGAC	TGGAG	TGGTA	TGGTT	TGGTC	TGGTG	TGGCA	TGGCT	TGGCC	TGGCG	TGGGA	TGGGT	TGGGC	TGG
A	CAAAA	CAAAT	CAAAC	CAAAG	CAATA	CAATT	CAATC	CAATG	CAACA	CAACT	CAACC	CAACG	CAAGA	CAAGT	CAAGC	CAA
T	CATAA	CATAT	CATAC	CATAG	CATTA	CATTT	CATTC	CATTG	CATCA	CATCT	CATCC	CATCG	CATGA	CATGT	CATGC	CAT
C	CACAA	CACAT	CACAC	CACAG	CACTA	CACTT	CACTC	CACTG	CACCA	CACCT	CACCC	CACCG	CACGA	CACGT	CACGC	CAC
G	CAGAA	CAGAT	CAGAC	CAGAG	CAGTA	CAGTT	CAGTC	CAGTG	CAGCA	CAGCT	CAGCC	CAGCG	CAGGA	CAGGT	CAGGC	CAG
Α	CTAAA	CTAAT	CTAAC	CTAAG	CTATA	CTATT	CTATC	CTATG	CTACA	CTACT	CTACC	CTACG	CTAGA	CTAGT	CTAGC	CTA
T	CTCAA	CTTAT	CTCAC	CTTAG	CTTTA	CTTTT	CTTTC	CTTTG	CTTCA	CTTCT	CTTCC	CTTCG	CTTGA	CTTGT	CTTGC	CTC
C	CTCAA	CTCAT	CTCAC	CTCAG	CTCTA	CTCTT	CTCTC	CTCTG	CTCCA	CTCCT	CTCCC	CTCCG	CTCGA	CTCGT	CTCGC	CTC
G	CTGAA	CTGAT	CTGAC	CTGAG	CTGTA	CTGTT	CTGTC	CTGTG	CTGCA	CTGCT	CTGCC	CTGCG	CTGGA	CTGGT	CTGGC	CTG
A T	CCAAA	CCAAT	CCTAC	CCAAG CCTAG	CCATA	CCATT	CCATC	CCATG	CCACA CCTCA	CCACT CCTCT	CCACC CCTCC	CCACG		CCAGT CCTGT	CCAGC CCTGC	CCA CCT
c	CCTAA CCCAA	CCTAT CCCAT	CCTAC CCCAC		CCTTA CCCTA	CCTTT CCCTT	CCTTC CCCTC	CCTTG CCCTG	CCCCA	CCCCT		CCTCG		CCCGT	CCCGC	
G	CCGAA	CCGAT	CCGAC		CCGTA	CCGTT	CCGTC	CCGTG	CCGCA	CCGCT	CCGCC	CCGCG		CCGGT	CCGGC	CCG
A	CGAAA	CGAT	CGAC	CGAAG	CGATA	CGATT	CGATC	CGATG	CGACA	CGACT	CGACC	CGACG		CGAGT	CGAGC	CGA
T	CGAAA	CGAAT	CGTAC	CGAAG	CGATA	CGTTT	CGATC	CGTTG	CGTCA	CGTCT	CGTCC	CGACG	CGTGA	CGAGT	CGAGC	CGA
Ċ	CGCAA	CGCAT	CGCAC	CGCAG	CGCTA	CGCTT	CGCTC	CGCTG	CGCCA	CGCCT	CGCCC	CGCCG		CGCGT	CGCGC	CGC
G	CGGAA	CGCAT	CGGAC	CGGAG	CGGTA	CGGTT	CGGTC	CGGTG	CGCCA	CGGCT	CGGCC	CGGCG	CGGGA	CGGGT	CGGGC	CGG
A	GAAAA	GAAAT	GAAAC	GAAAG	GAATA	GAATT	GAATC	GAATG	GAACA	GAACT	GAACC	GAACG	GAAGA	GAAGT	GAAGC	GAA
T	GATAA	GATAT	GATAC	GATAG	GATTA	GATTT	GATTC	GATTG	GATCA	GATCT	GATCC	GATCG	GATGA	GATGT	GATGC	GAT
Ċ	GACAA	GACAT	GACAC	GACAG	GACTA	GACTT	GACTC	GACTG	GACCA	GACCT	GACCC	GACCG	GACGA	GACGT	GACGC	GAC
G	GAGAA	GAGAT	GAGAC	GAGAG	GAGTA	GAGTT	GAGTC	GAGTG	GAGCA	GAGCT	GAGCC	GAGCG	GAGGA	GAGGT	GAGGC	GAG
A	GTAAA	GTAAT	GTAAC	GTAAG	GTATA	GTATT	GTATC	GTATG	GTACA	GTACT	GTACC	GTACG		GTAGT	GTAGC	GTA
T	GTTAA	GTTAT	GTTAC	GTTAG	GTTTA	GTTTT	GTTTC	GTTTG	GTTCA	GTTCT	GTTCC	GTTCG		GTTGT	GTTGC	GTT
Ċ	GTCAA	GTCAT	GTCAC	GTCAG	GTCTA	GTCTT	GTCTC	GTCTG	GTCCA	GTCCT	GTCCC	GTCCG	GTCGA	GTCGT	GTCGC	GTC
G	GTGAA	GTGAT	GTGAC	GTGAG	GTGTA	GTGTT	GTGTC	GTGTG	GTGCA	GTGCT	GTGCC	GTGCG		GTGGT	GTGGC	GTO
Ā	GCAAA	GCAAT	GCAAC	GCAAG	GCATA	GCATT	GCATC	GCATG	GCACA	GCACT	GCACC	GCACG	GCAGA	GCAGT	GCAGC	GCA
Т	GCTAA	GCTAT	GCTAC	GCTAG	GCTTA	GCTTT	GCTTC	GCTTG	GCTCA	GCTCT	GCTCC	GCTCG	GCTGA	GCTGT	GCTGC	GCT
C	GCCAA	GCCAT	GCCAC	GCCAG	GCCTA	GCCTT	GCCTC	GCCTG	GCCCA	GCCCT	GCCCC	GCCCG	GCCGA	GCCGT	GCCGC	GCC
G	GCGAA	GCGAT	GCGAC	GCGAG	GCGTA	GCGTT	GCGTC	GCGTG	GCGCA	GCGCT	GCGCC	GCGCG	GCGGA	GCGGT	GCGGC	GCG
Α	GGAAA	GGAAT	GGAAC	GGAAG	GGATA	GGATT	GGATC	GGATG	GGACA	GGACT	GGACC	GGACG	GGAGA	GGAGT	GGAGC	GGA
iΤ	GGTAA	GGTAT	GGTAC	GGTAG	GGTTA	GGTTT	GGTTC	GGTTG	GGTCA	GGTCT	GGTCC	GGTCG	GGTGA	GGTGT	GGTGC	GGT
C	GGCAA	GGCAT	GGCAC	GGCAG	GGCTA	GGCTT	GGCTC	GGCTG	GGCCA	GGCCT	GGCCC	GGCCG	GGCGA	GGCGT	GGCGC	
G	GGGAA	GGGAT	GGGAC	GGGAG	GGGTA	GGGTT	GGGTC	GGGTG	GGGCA	GGGCT	GGGCC	GGGCG	GGGGA	GGGGT	GGGGC	GGG

Before filtering: read2: overrepresented sequences

Sampling rate: 1 / 20

overrepresented	sequence	count (% of bases)	distribution: cycle 1 ~ cycle 151
AAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAA	AAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAA	1670 (0.007056%)	
AAAGATCGGAAGAGCGTCGTGTAG	GGGAAAGAGTGTTAATG	28720 (0.048541%)	
AAGAGCGTCGTGTAGGGAAAGAGT	GTTAATGGCAAGGTGG	35 (0.000059%)	
AAGAGCGTCGTGTAGGGAAAGAGT	GTTAATGGCAAGGTGT	425 (0.000718%)	
AAGATCGGAAGAGCGTCGTGTAGG	GGAAAGAGTGTTAATGG	20 (0.000034%)	

ACAAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAAT	28121 (0.047529%)	
ACACACACACACACACACACACACACACACACACACA	3426 (0.005790%)	
AC	98731 (0.166870%)	
ACACACACACACACACACACACACACACACACACACAC	766 (0.003237%)	
AC	2521 (0.004261%)	
ACAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	43653 (0.073780%)	
AG	15062 (0.025457%)	
AGAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	50666 (0.085633%)	
AGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTA	457 (0.000772%)	
AGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTT	127 (0.000215%)	
AGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGC	109 (0.000184%)	
AGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGA	191 (0.000323%)	
AGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGG	37 (0.000063%)	
AGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGT	85 (0.000144%)	
AGGGAAAGAGTGTTAATGGCAAGGTGTAGATCTCGGTGGT	249 (0.000421%)	
AGTGTGTGTGTGTGTGTGTGTGTGTGTGTG	29171 (0.049303%)	
ATAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	41490 (0.070124%)	
ATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAA	2149 (0.003632%)	
ATGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	32613 (0.055121%)	
CAAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	40193 (0.067932%)	
CACACACACACACACACACACACACACACACAAA	2455 (0.004149%)	
CACACACACACACACACACACACACACACACACACA	64140 (0.108406%)	
CACACACACACACACACACACACACACACACACACACA	1058 (0.004470%)	
CACACACACACACACACACACACACACACACACACACA	1557 (0.002632%)	
CAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG	8 (0.000014%)	
CCAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	51751 (0.087467%)	
ccccccccccccc	25483 (0.021535%)	
CGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGG	769 (0.001300%)	
CGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGATC	84 (0.000142%)	
CGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGTTC	30 (0.000051%)	
CGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGTTG	11 (0.000019%)	
CGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGATCTCG	216 (0.000365%)	
CGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGTTCTCG	80 (0.000135%)	
CTAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	48763 (0.082416%)	

стстстстстстстстстстстстстстстст	9687 (0.016372%)	
GAAAGAGTGTTAATGGCAAGGTGTAGATCTCGGTGGTCGC	38 (0.000064%)	
GAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTG	1112 (0.001879%)	
GAAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	28432 (0.048054%)	
GA	13860 (0.023425%)	
GAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG	29137 (0.049246%)	
GAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAG	1317 (0.002226%)	
GAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTTG	328 (0.000554%)	
GATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCA	848 (0.001433%)	
GCACACACACACACACACACACACACACACACACACACA	43014 (0.072700%)	
GCAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	37725 (0.063761%)	
GCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGAT	177 (0.000299%)	
GCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGGT	97 (0.000164%)	
GCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGTT	162 (0.000274%)	
GGAAAGAGTGTTAATGGCAAGGTGTAGATCTCGGTGGTCG	131 (0.000221%)	
GGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAGGT	721 (0.001219%)	
GGAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	51754 (0.087472%)	
GGGAAAGAGTGTTAATGGCAAGGTGTAGATCTCGGTGGTC	70 (0.000118%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	31995 (0.135190%)	
GGGGGGG	24500 (0.154247%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	28297 (0.047826%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	2694 (0.004553%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	3172 (0.005361%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	2354 (0.003979%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	2989 (0.005052%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	2009 (0.003395%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	2449 (0.004139%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	1713 (0.002895%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	2223 (0.003757%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	1600 (0.002704%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	3960 (0.016732%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	209 (0.000883%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG		

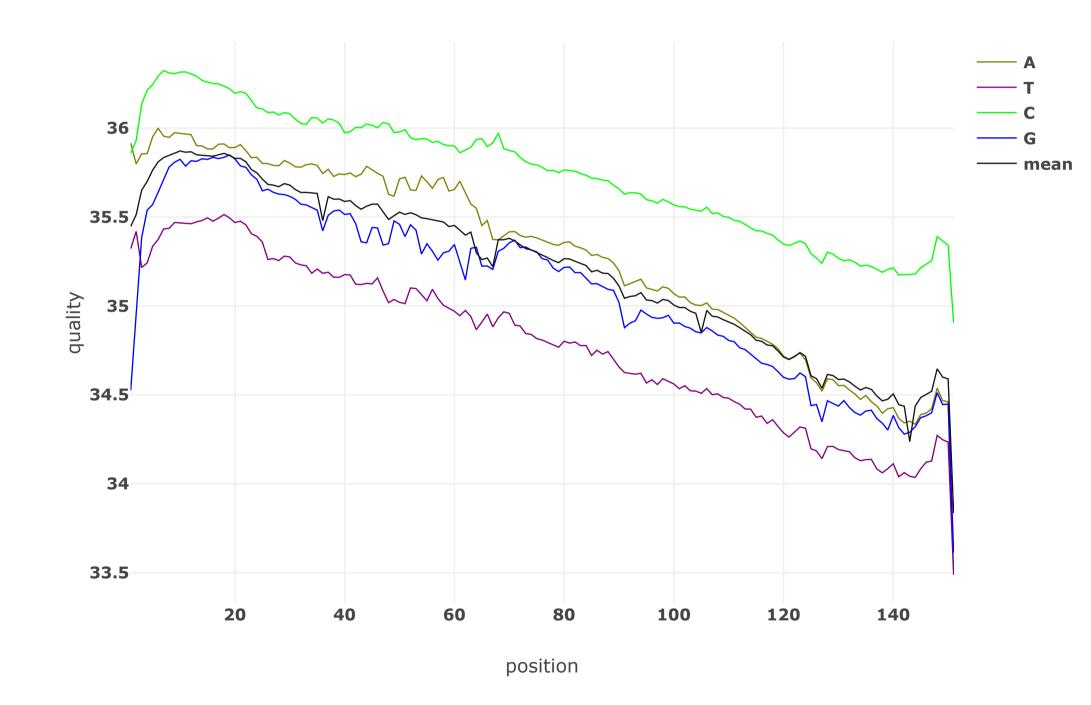
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	351 (0.001483%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	352 (0.001487%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	532 (0.002248%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	519 (0.002193%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	623 (0.002632%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	625 (0.002641%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	829 (0.003503%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	830 (0.003507%)	
GGGTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	1530 (0.006465%)	
GGTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	2138 (0.009034%)	
GTAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	39620 (0.066963%)	
GTAGGGAAAGAGTGTTAATGGCAAGGTGTAGATCTCGGTG	293 (0.000495%)	
GTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGATCT	186 (0.000314%)	
GTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGTTCT	60 (0.000101%)	
GTCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGTTGT	57 (0.000096%)	
GTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	84232 (0.142364%)	
GTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	4485 (0.018951%)	
GTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGATCTCGG	163 (0.000275%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTG	1521 (0.002571%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	39330 (0.066473%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	387 (0.001635%)	
TAAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	42728 (0.072216%)	
TAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGG	14 (0.000024%)	
TAGGGAAAGAGTGTTAATGGCAAGGTGTAGATCTCGGTGG	89 (0.000150%)	
TCAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	46839 (0.079165%)	
TCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATGGCAAG	639 (0.001080%)	
TCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGATCTC	140 (0.000237%)	
TCGTGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGTTCTC	68 (0.000115%)	
тстстстстстстстстстстстстстстстс	12449 (0.021041%)	
TGAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	86880 (0.146840%)	
TGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	11442 (0.019339%)	
TGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	4618 (0.019513%)	
TGTAGGGAAAGAGTGTTAATGGCAAGGTGTAGATCTCGGT	108 (0.000183%)	
TGTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG		

	41384 (0.069945%)	
TGTGTGTGTGTGTGTGTGTGTGTGTGTGAG	2647 (0.004474%)	
тстстстстстстстстстстстстстстс	70321 (0.118853%)	
TGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTG	741 (0.003131%)	
TTAGATCGGAAGAGCGTCGTGTAGGGAAAGAGTGTTAATG	60416 (0.102112%)	
TTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	28677 (0.048468%)	

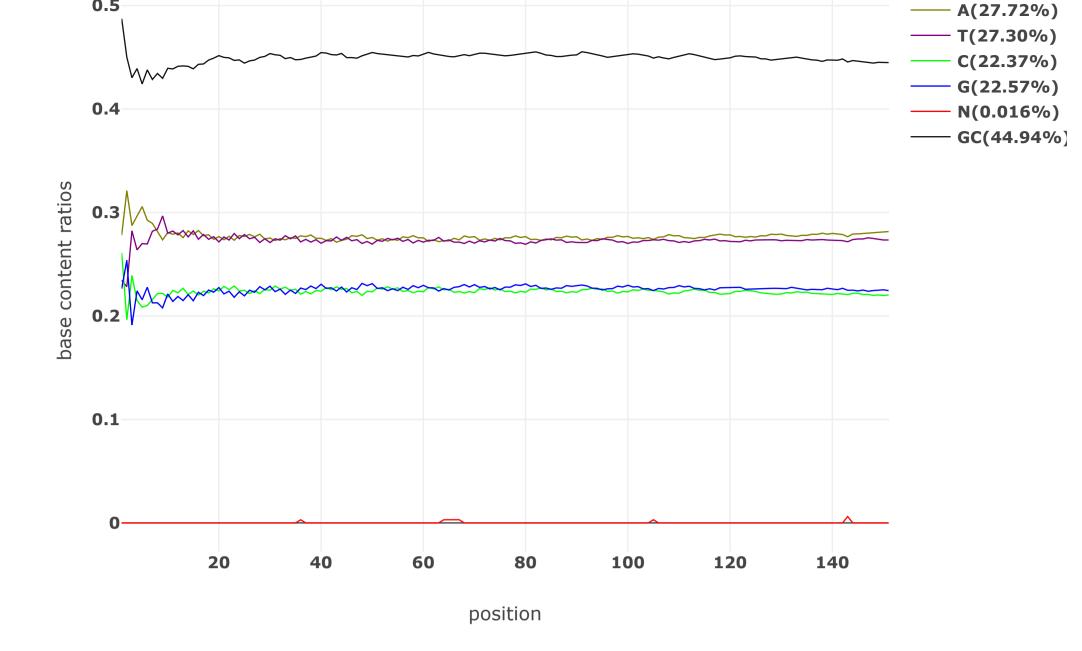
After filtering

After filtering: read1: quality

Value of each position will be shown on mouse over.



After filtering: read1: base contents



After filtering: read1: KMER counting

Darker background means larger counts. The count will be shown on mouse over.

	AA	AT	AC	AG	TA	TT	TC	TG	CA	CT	CC	CG	GA	GT	GC	GG
AAA	AAAA	AAAAT	AAAAC	AAAAG	AAATA	AAATT	AAATC	AAATG	AAACA	AAACT	AAACC	AAACG	AAAGA	AAAGT	AAAGC	AAAGG
AAT	AATAA	AATAT	AATAC	AATAG	AATTA	AATTT	AATTC	AATTG	AATCA	AATCT	AATCC	AATCG	AATGA	AATGT	AATGC	AATGG
AAC	AACAA	AACAT	AACAC	AACAG	AACTA	AACTT	AACTC	AACTG	AACCA	AACCT	AACCC	AACCG	AACGA	AACGT	AACGC	AACGG
AAG	AAGAA	AAGAT	AAGAC	AAGAG	AAGTA	AAGTT	AAGTC	AAGTG	AAGCA	AAGCT	AAGCC	AAGCG	AAGGA	AAGGT	AAGGC	AAGGG
ATA	ATAAA	ATAAT	ATAAC	ATAAG	ATATA	ATATT	ATATC	ATATG	ATACA	ATACT	ATACC	ATACG	ATAGA	ATAGT	ATAGC	ATAGG
ATT	ATTAA	ATTAT	ATTAC	ATTAG	ATTTA	ATTTT	ATTTC	ATTTG	ATTCA	ATTCT	ATTCC	ATTCG	ATTGA	ATTGT	ATTGC	ATTGG
ATC	ATCAA	ATCAT	ATCAC	ATCAG	ATCTA	ATCTT	ATCTC	ATCTG	ATCCA	ATCCT	ATCCC	ATCCG	ATCGA	ATCGT	ATCGC	ATCGG
ATG	ATGAA	ATGAT	ATGAC	ATGAG	ATGTA	ATGTT	ATGTC	ATGTG	ATGCA	ATGCT	ATGCC	ATGCG	ATGGA	ATGGT	ATGGC	ATGGG
ACA	ACAAA	ACAAT	ACAAC	ACAAG	ACATA	ACATT	ACATC	ACATG	ACACA	ACACT	ACACC	ACACG	ACAGA	ACAGT	ACAGC	ACAGG
ACT	ACTAA	ACTAT	ACTAC	ACTAG	ACTTA	ACTTT	ACTTC	ACTTG	ACTCA	ACTCT	ACTCC	ACTCG	ACTGA	ACTGT	ACTGC	ACTGG
ACC	ACCAA	ACCAT	ACCAC	ACCAG	ACCTA	ACCTT	ACCTC	ACCTG	ACCCA	ACCCT	ACCCC	ACCCG	ACCGA	ACCGT	ACCGC	ACCGG
ACG	ACGAA	ACGAT	ACGAC	ACGAG	ACGTA	ACGTT	ACGTC	ACGTG	ACGCA	ACGCT	ACGCC	ACGCG	ACGGA	ACGGT	ACGGC	ACGGG
AGA	AGAAA	AGAAT	AGAAC	AGAAG	AGATA	AGATT	AGATC	AGATG	AGACA	AGACT	AGACC	AGACG	AGAGA	AGAGT	AGAGC	AGAGG
AGT	AGTAA	AGTAT	AGTAC	AGTAG	AGTTA	AGTTT	AGTTC	AGTTG	AGTCA	AGTCT	AGTCC	AGTCG	AGTGA	AGTGT	AGTGC	AGTGG
AGC	AGCAA	AGCAT	AGCAC	AGCAG	AGCTA	AGCTT	AGCTC	AGCTG	AGCCA	AGCCT	AGCCC	AGCCG	AGCGA	AGCGT	AGCGC	AGCGG
AGG	AGGAA	AGGAT	AGGAC	AGGAG	AGGTA	AGGTT	AGGTC	AGGTG	AGGCA	AGGCT	AGGCC	AGGCG	AGGGA	AGGGT	AGGGC	AGGGG
TAA	TAAAA	TAAAT	TAAAC	TAAAG	TAATA	TAATT	TAATC	TAATG	TAACA	TAACT	TAACC	TAACG	TAAGA	TAAGT	TAAGC	TAAGG
TAT	TATAA	TATAT	TATAC	TATAG	TATTA	TATTT	TATTC	TATTG	TATCA	TATCT	TATCC	TATCG	TATGA	TATGT	TATGC	TATGG
TAC	TACAA	TACAT	TACAC	TACAG	TACTA	TACTT	TACTC	TACTG	TACCA	TACCT	TACCC	TACCG	TACGA	TACGT	TACGC	TACGG
TAG	TAGAA	TAGAT	TAGAC	TAGAG	TAGTA	TAGTT	TAGTC	TAGTG	TAGCA	TAGCT	TAGCC	TAGCG	TAGGA	TAGGT	TAGGC	TAGGG
TTA	TTAAA	TTAAT	TTAAC	TTAAG	TTATA	TTATT	TTATC	TTATG	TTACA	TTACT	TTACC	TTACG	TTAGA	TTAGT	TTAGC	TTAGG
TTT	TTTAA	TTTAT	TTTAC	TTTAG	TTTTA	TTTTT	TTTTC	TTTTG	TTTCA	TTTCT	TTTCC	TTTCG	TTTGA	TTTGT	TTTGC	TTTGG
TTC	TTCAA	TTCAT	TTCAC	TTCAG	TTCTA	TTCTT	TTCTC	TTCTG	TTCCA	TTCCT	TTCCC	TTCCG	TTCGA	TTCGT	TTCGC	TTCGG
TTG	TTGAA	TTGAT	TTGAC	TTGAG	TTGTA	TTGTT	TTGTC	TTGTG	TTGCA	TTGCT	TTGCC	TTGCG	TTGGA	TTGGT	TTGGC	TTGGG
TCA	TCAAA	TCAAT	TCAAC	TCAAG	TCATA	TCATT	TCATC	TCATG	TCACA	TCACT	TCACC	TCACG	TCAGA	TCAGT	TCAGC	TCAGG
TCT	TCTAA	TCTAT	TCTAC	TCTAG	TCTTA	TCTTT	TCTTC	TCTTG	TCTCA	TCTCT	TCTCC	TCTCG	TCTGA	TCTGT	TCTGC	TCTGG
TCC	TCCAA	TCCAT	TCCAC	TCCAG	TCCTA	TCCTT	TCCTC	TCCTG	TCCCA	TCCCT	TCCCC	TCCCG	TCCGA	TCCGT	TCCGC	TCCGG
TCG	TCGAA	TCGAT	TCGAC	TCGAG	TCGTA	TCGTT	TCGTC	TCGTG	TCGCA	TCGCT	TCGCC	TCGCG	TCGGA	TCGGT	TCGGC	TCGGG
TGA	TGAAA	TGAAT	TGAAC	TGAAG	TGATA	TGATT	TGATC	TGATG	TGACA	TGACT	TGACC	TGACG	TGAGA	TGAGT	TGAGC	TGAGG
TGT	TGTAA	TGTAT	TGTAC	TGTAG	TGTTA	TGTTT	TGTTC	TGTTG	TGTCA	TGTCT	TGTCC	TGTCG	TGTGA	TGTGT	TGTGC	TGTGG
TGC	TGCAA	TGCAT	TGCAC	TGCAG	TGCTA	TGCTT	TGCTC	TGCTG	TGCCA	TGCCT	TGCCC	TGCCG	TGCGA	TGCGT	TGCGC	TGCGG
TGG	TGGAA	TGGAT	TGGAC	TGGAG	TGGTA	TGGTT	TGGTC	TGGTG	TGGCA	TGGCT	TGGCC	TGGCG	TGGGA	TGGGT	TGGGC	TGGGG
CAA	CAAAA	CAAAT	CAAAC	CAAAG	CAATA	CAATT	CAATC	CAATG	CAACA	CAACT	CAACC	CAACG	CAAGA	CAAGT	CAAGC	CAAGG
CAT	CATAA	CATAT	CATAC	CATAG	CATTA	CATTT	CATTC	CATTG	CATCA	CATCT	CATCC	CATCG	CATGA	CATGT	CATGC	CATGG
CAC	CACAA	CACAT	CACAC	CACAG	CACTA	CACTT	CACTC	CACTG	CACCA	CACCT	CACCC	CACCG	CACGA	CACGT	CACGC	CACGG
CAG	CAGAA	CAGAT	CAGAC	CAGAG	CAGTA	CAGTT	CAGTC	CAGTG	CAGCA	CAGCT	CAGCC	CAGCG	CAGGA	CAGGT	CAGGC	CAGGG
CTA	CTAAA	CTAAT	CTAAC	CTAAG	CTATA	CTATT	CTATC	CTATG	CTACA	CTACT	CTACC	CTACG	CTAGA	CTAGT	CTAGC	CTAGG
CTT	CTTAA	CTTAT	CTTAC	CTTAG	CTTTA	CTTTT	CTTTC	CTTTG	CTTCA	CTTCT	CTTCC	CTTCG	CTTGA	CTTGT	CTTGC	CTTGG
CTC	CTCAA	CTCAT	CTCAC	CTCAG	CTCTA	СТСТТ	СТСТС	CTCTG	CTCCA	СТССТ	СТССС	CTCCG	CTCGA	CTCGT	CTCGC	CTCGG
CTG	CTGAA	CTGAT	CTGAC	CTGAG	CTGTA	CTGTT	CTGTC	CTGTG	CTGCA	CTGCT	CTGCC	CTGCG	CTGGA	CTGGT	CTGGC	CTGGG
CCA	CCAAA	CCAAT	CCAAC	CCAAG	CCATA	CCATT	CCATC	CCATG	CCACA	CCACT	CCACC	CCACG	CCAGA	CCAGT	CCAGC	CCAGG
CCT	ССТАА	CCTAT	CCTAC	CCTAG	CCTTA	CCTTT	CCTTC	CCTTG	CCTCA	CCTCT	ССТСС	CCTCG	CCTGA	CCTGT	CCTGC	CCTGG
CCC	CCCAA	CCCAT	CCCAC	CCCAG	CCCTA	CCCTT	СССТС	CCCTG	CCCCA	CCCCT	CCCCC	CCCCG	CCCGA	CCCGT	CCCGC	CCCGG
CCG	CCGAA	CCGAT	CCGAC	CCGAG	CCGTA	CCGTT	CCGTC	CCGTG	CCGCA	CCGCT	CCGCC	CCGCG	CCGGA	CCGGT	CCGGC	CCGGG
CGA	CGAAA	CGAAT	CGAAC	CGAAG	CGATA	CGATT	CGATC	CGATG	CGACA	CGACT	CGACC	CGACG	CGAGA	CGAGT	CGAGC	CGAGG
CGT	CGTAA	CGTAT	CGTAC	CGTAG	CGTTA	CGTTT	CGTTC	CGTTG	CGTCA	CGTCT	CGTCC	CGTCG	CGTGA	CGTGT	CGTGC	CGTGG
CGC	CGCAA	CGCAT	CGCAC	CGCAG	CGCTA	CGCTT	CGCTC	CGCTG	CGCCA	CGCCT	CGCCC	CGCCG	CGCGA	CGCGT	CGCGC	CGCGG
CGG	CGGAA	CGGAT	CGGAC	CGGAG	CGGTA	CGGTT	CGGTC	CGGTG	CGGCA	CGGCT	CGGCC	CGGCG	CGGGA	CGGGT	CGGGC	CGGGG

GAA	GAAAA	GAAAT	GAAAC	GAAAG	GAATA	GAATT	GAATC	GAATG	GAACA	GAACT	GAACC	GAACG	GAAGA	GAAGT	GAAGC	GAAGG
GAT	GATAA	GATAT	GATAC	GATAG	GATTA	GATTT	GATTC	GATTG	GATCA	GATCT	GATCC	GATCG	GATGA	GATGT	GATGC	GATGG
GAC	GACAA	GACAT	GACAC	GACAG	GACTA	GACTT	GACTC	GACTG	GACCA	GACCT	GACCC	GACCG	GACGA	GACGT	GACGC	GACGG
GAG	GAGAA	GAGAT	GAGAC	GAGAG	GAGTA	GAGTT	GAGTC	GAGTG	GAGCA	GAGCT	GAGCC	GAGCG	GAGGA	GAGGT	GAGGC	GAGGG
GTA	GTAAA	GTAAT	GTAAC	GTAAG	GTATA	GTATT	GTATC	GTATG	GTACA	GTACT	GTACC	GTACG	GTAGA	GTAGT	GTAGC	GTAGG
GTT	GTTAA	GTTAT	GTTAC	GTTAG	GTTTA	GTTTT	GTTTC	GTTTG	GTTCA	GTTCT	GTTCC	GTTCG	GTTGA	GTTGT	GTTGC	GTTGG
GTC	GTCAA	GTCAT	GTCAC	GTCAG	GTCTA	GTCTT	GTCTC	GTCTG	GTCCA	GTCCT	GTCCC	GTCCG	GTCGA	GTCGT	GTCGC	GTCGG
GTG	GTGAA	GTGAT	GTGAC	GTGAG	GTGTA	GTGTT	GTGTC	GTGTG	GTGCA	GTGCT	GTGCC	GTGCG	GTGGA	GTGGT	GTGGC	GTGGG
GCA	GCAAA	GCAAT	GCAAC	GCAAG	GCATA	GCATT	GCATC	GCATG	GCACA	GCACT	GCACC	GCACG	GCAGA	GCAGT	GCAGC	GCAGG
GCT	GCTAA	GCTAT	GCTAC	GCTAG	GCTTA	GCTTT	GCTTC	GCTTG	GCTCA	GCTCT	GCTCC	GCTCG	GCTGA	GCTGT	GCTGC	GCTGG
GCC	GCCAA	GCCAT	GCCAC	GCCAG	GCCTA	GCCTT	GCCTC	GCCTG	GCCCA	GCCCT	GCCCC	GCCCG	GCCGA	GCCGT	GCCGC	GCCGG
GCG	GCGAA	GCGAT	GCGAC	GCGAG	GCGTA	GCGTT	GCGTC	GCGTG	GCGCA	GCGCT	GCGCC	GCGCG	GCGGA	GCGGT	GCGGC	GCGGG
GGA	GGAAA	GGAAT	GGAAC	GGAAG	GGATA	GGATT	GGATC	GGATG	GGACA	GGACT	GGACC	GGACG	GGAGA	GGAGT	GGAGC	GGAGG
GGT	GGTAA	GGTAT	GGTAC	GGTAG	GGTTA	GGTTT	GGTTC	GGTTG	GGTCA	GGTCT	GGTCC	GGTCG	GGTGA	GGTGT	GGTGC	GGTGG
GGC	GGCAA	GGCAT	GGCAC	GGCAG	GGCTA	GGCTT	GGCTC	GGCTG	GGCCA	GGCCT	GGCCC	GGCCG	GGCGA	GGCGT	GGCGC	GGCGG
GGG	$GGG\Delta\Delta$	GGGAT	GGGAC	GGGAG	GGGTA	GGGTT	GGGTC	GGGTG	$GGGC\Delta$	GGGCT	GGGCC	GGGCG	$GGGG\Delta$	GGGGT	GGGGC	GGGGG

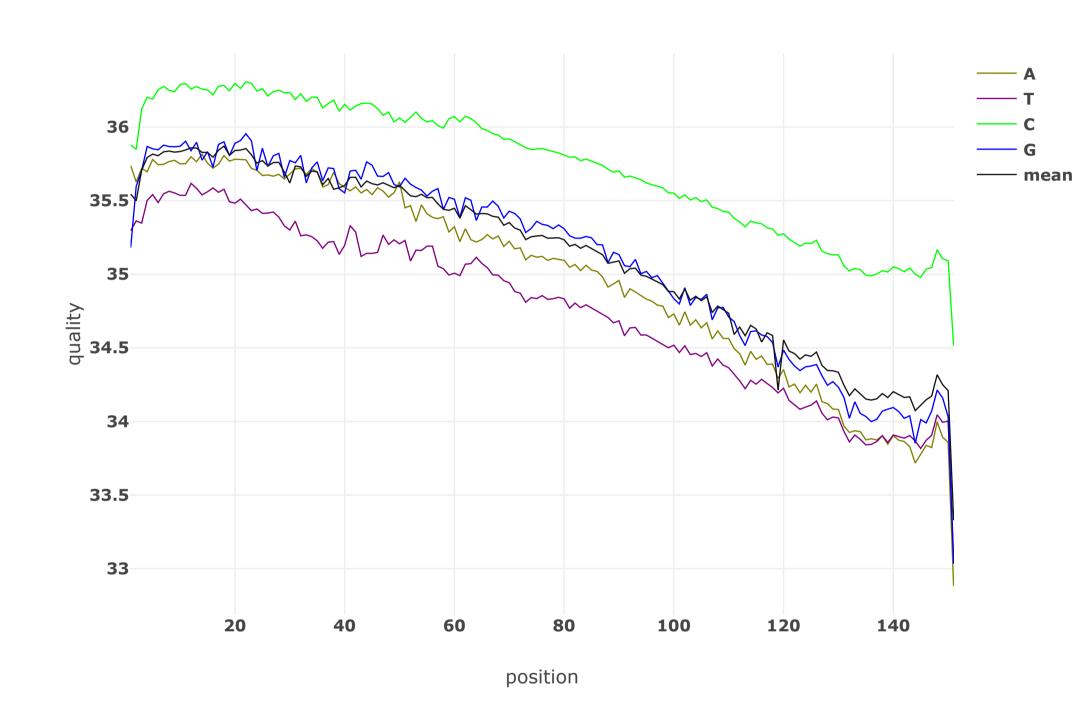
After filtering: read1: overrepresented sequences

overrepresented sequence	count (% of bases)	distribution: cycle 1 ~ cycle 151
AAAAAAAAA	132908 (0.065046%)	
AACACACACACACACACACACACACACACACACA	31771 (0.062195%)	
ACACACACACACACACACACACACACACACACACAA	966 (0.001891%)	
AC	29156 (0.057076%)	
ACACACACACACACACACACACACACACACACACACAC	757 (0.003705%)	
ACACACACACACACACACACACACACACACACAG	848 (0.001660%)	
AG	12706 (0.024873%)	
ATGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	31985 (0.062614%)	
CACACACACACACACACACACACACACACAAA	1791 (0.003506%)	
CACACACACACACACACACACACACACACACACA	27306 (0.053455%)	
CACACACACACACACACACACACACACACACACACACA	1034 (0.005060%)	
CACACACACACACACACACACACACACACACAC	565 (0.001106%)	
стстстстстстстстстстстстстстст	6262 (0.012259%)	
GA	11628 (0.022763%)	
GCACACACACACACACACACACACACACACACAC	38491 (0.075350%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	207 (0.000405%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGA	1724 (0.003375%)	
стстстстстстстстстстстстстстстст	60422 (0.118283%)	
стстстстстстстстстстстстстстстстстстст	305 (0.001493%)	
<u> стстстстстстстстстстстстстстст</u>	936 (0.001832%)	
TACACACACACACACACACACACACACACACACA	30104 (0.058932%)	
TCACACACACACACACACACACACACACACACACACACA	26989 (0.052834%)	
тстстстстстстстстстстстстстстстс	7847 (0.015361%)	
TGTGTGTGTGTGTGTGTGTGTGTGTGTGAG	1862 (0.003645%)	
rgtgtgtgtgtgtgtgtgtgtgtgtgtg	41641 (0.081517%)	
тс	557 (0.002726%)	

GTGTGTGTGTGTGTGTGTGTG		
TGTGTGTGTGTGTGTGTGTGTGTGTGTGTTGTT	917 (0.001795%)	
TTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	26546 (0.051967%)	

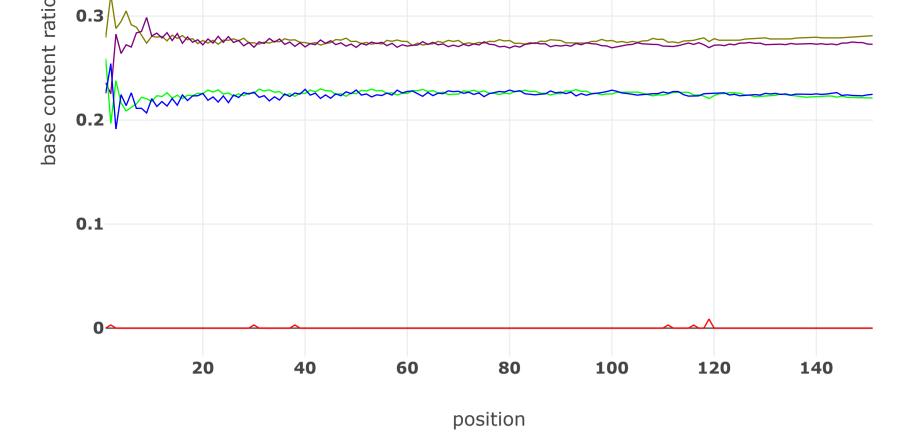
After filtering: read2: quality

Value of each position will be shown on mouse over.



After filtering: read2: base contents





After filtering: read2: KMER counting

Darker background means larger counts. The count will be shown on mouse over.

	AA	AT	AC	AG	TA	TT	TC	TG	CA	СТ	CC	CG	GA	GT	GC	GG
AAA	AAAAA	AAAAT	AAAAC	AAAAG	AAATA	AAATT	AAATC	AAATG	AAACA	AAACT	AAACC	AAACG	AAAGA	AAAGT	AAAGC	AAAGG
AAT	AATAA	AATAT	AATAC	AATAG	AATTA	AATTT	AATTC	AATTG	AATCA	AATCT	AATCC	AATCG	AATGA	AATGT	AATGC	AATGG
AAC	AACAA	AACAT	AACAC	AACAG	AACTA	AACTT	AACTC	AACTG	AACCA	AACCT	AACCC	AACCG	AACGA	AACGT	AACGC	AACGG
AAG	AAGAA	AAGAT	AAGAC	AAGAG	AAGTA	AAGTT	AAGTC	AAGTG	AAGCA	AAGCT	AAGCC	AAGCG	AAGGA	AAGGT	AAGGC	AAGGG
ATA	ATAAA	ATAAT	ATAAC	ATAAG	ATATA	ATATT	ATATC	ATATG	ATACA	ATACT	ATACC	ATACG	ATAGA	ATAGT	ATAGC	ATAGG
ATT	ATTAA	ATTAT	ATTAC	ATTAG	ATTTA	ATTTT	ATTTC	ATTTG	ATTCA	ATTCT	ATTCC	ATTCG	ATTGA	ATTGT	ATTGC	ATTGG
ATC	ATCAA	ATCAT	ATCAC	ATCAG	ATCTA	ATCTT	ATCTC	ATCTG	ATCCA	ATCCT	ATCCC	ATCCG	ATCGA	ATCGT	ATCGC	ATCGG
ATG	ATGAA	ATGAT	ATGAC	ATGAG	ATGTA	ATGTT	ATGTC	ATGTG	ATGCA	ATGCT	ATGCC	ATGCG	ATGGA	ATGGT	ATGGC	ATGGG
ACA	ACAAA	ACAAT	ACAAC	ACAAG	ACATA	ACATT	ACATC	ACATG	ACACA	ACACT	ACACC	ACACG	ACAGA	ACAGT	ACAGC	ACAGG
ACT	ACTAA	ACTAT	ACTAC	ACTAG	ACTTA	ACTTT	ACTTC	ACTTG	ACTCA	ACTCT	ACTCC	ACTCG	ACTGA	ACTGT	ACTGC	ACTGG
ACC	ACCAA	ACCAT	ACCAC	ACCAG	ACCTA	ACCTT	ACCTC	ACCTG	ACCCA	ACCCT	ACCCC	ACCCG	ACCGA	ACCGT	ACCGC	ACCGG
ACG	ACGAA	ACGAT AGAAT	ACGAC	ACGAG	ACGTA	ACGTT AGATT	ACGTC AGATC	ACGTG AGATG	ACGCA	ACGCT	ACGCC AGACC	ACGCG	ACGGA	ACGGT	ACGGC AGAGC	ACGGG AGAGG
AGA AGT	AGAAA AGTAA	AGAAT	AGAAC AGTAC	AGAAG AGTAG	AGATA AGTTA	AGATT	AGTTC	AGTTG	AGACA AGTCA	AGACT AGTCT	AGTCC	AGACG AGTCG	AGAGA AGTGA	AGAGT AGTGT	AGAGC	AGAGG
		-	-													
AGC AGG	AGCAA	AGCAT AGGAT	AGCAC	AGCAG	AGCTA	AGCTT	AGCTC	AGCTG	AGCCA	AGCCT	AGCCC AGGCC	AGCCG	AGCGA	AGCGT	AGCGC AGGGC	AGCGG AGGGG
TAA	AGGAA TAAAA	TAAAT	AGGAC TAAAC	AGGAG TAAAG	AGGTA TAATA	AGGTT TAATT	AGGTC TAATC	AGGTG TAATG	AGGCA TAACA	AGGCT TAACT	TAACC	AGGCG TAACG	AGGGA TAAGA	AGGGT TAAGT	TAAGC	TAAGG
TAT																
TAC	TATAA TACAA	TATAT TACAT	TATAC TACAC	TATAG TACAG	TATTA TACTA	TATTT TACTT	TATTC TACTC	TATTG TACTG	TATCA TACCA	TATCT TACCT	TATCC TACCC	TATCG TACCG	TATGA TACGA	TATGT TACGT	TATGC TACGC	TATGG TACGG
TAG	TAGAA	TAGAT	TAGAC	TAGAG	TAGTA	TAGTT	TAGTC	TAGTG	TAGCA	TAGCT	TACCC	TACCG	TAGGA	TAGGT	TAGGC	TAGGG
TTA	TAGAA	TTAAT	TTAGAC	TTAGAG	TTATA	TTATT	TTATC	TTATG	TTACA	TAGCT	TTACC	TAGCG	TAGGA	TTAGGT	TTAGC	TTAGGG
TTT	TTTAA	TTTAT	TTTAC	TTTAG	TTTTA	TTTTT	TITIC	TTTTG	TTTCA	TTTCT	TTTCC	TTTCG	TTTGA	TTTGT	TTTGC	TTTGG
TTC	TTCAA	TTCAT	TTCAC	TTCAG	TTCTA	TTCTT	TICIC	TTCTG	TTCCA	TTCCT	TTCCC	TTCCG	TTCGA	TTCGT	TTCGC	TTCGG
TTG	TTGAA	TTGAT	TTGAC	TTGAG	TTGTA	TTGTT	TTGTC	TTGTG	TTGCA	TTGCT	TTGCC	TTGCG	TTGGA	TTGGT	TTGGC	TTGGG
TCA	TCAAA	TCAAT	TCAAC	TCAAG	TCATA	TCATT	TCATC	TCATG	TCACA	TCACT	TCACC	TCACG	TCAGA	TCAGT	TCAGC	TCAGG
TCT	TCTAA	TCTAT	TCTAC	TCTAG	TCTTA	TCTTT	ТСТТС	TCTTG	TCTCA	TCTCT	TCTCC	TCTCG	TCTGA	TCTGT	TCTGC	TCTGG
TCC	TCCAA	TCCAT	TCCAC	TCCAG	TCCTA	TCCTT	тсстс	TCCTG	TCCCA	TCCCT	TCCCC	TCCCG	TCCGA	TCCGT	TCCGC	TCCGG
TCG	TCGAA	TCGAT	TCGAC	TCGAG	TCGTA	TCGTT	TCGTC	TCGTG	TCGCA	TCGCT	TCGCC	TCGCG	TCGGA	TCGGT	TCGGC	TCGGG
ΓGA	TGAAA	TGAAT	TGAAC	TGAAG	TGATA	TGATT	TGATC	TGATG	TGACA	TGACT	TGACC	TGACG	TGAGA	TGAGT	TGAGC	TGAGG
TGT	TGTAA	TGTAT	TGTAC	TGTAG	TGTTA	TGTTT	TGTTC	TGTTG	TGTCA	TGTCT	TGTCC	TGTCG	TGTGA	TGTGT	TGTGC	TGTGG
TGC	TGCAA	TGCAT	TGCAC	TGCAG	TGCTA	TGCTT	TGCTC	TGCTG	TGCCA	TGCCT	TGCCC	TGCCG	TGCGA	TGCGT	TGCGC	TGCGG
TGG	TGGAA	TGGAT	TGGAC	TGGAG	TGGTA	TGGTT	TGGTC	TGGTG	TGGCA	TGGCT	TGGCC	TGGCG	TGGGA	TGGGT	TGGGC	TGGGG
CAA	CAAAA	CAAAT	CAAAC	CAAAG	CAATA	CAATT	CAATC	CAATG	CAACA	CAACT	CAACC	CAACG	CAAGA	CAAGT	CAAGC	CAAGG
CAT	CATAA	CATAT	CATAC	CATAG	CATTA	CATTT	CATTC	CATTG	CATCA	CATCT	CATCC	CATCG	CATGA	CATGT	CATGC	CATGG
CAC	CACAA	CACAT	CACAC	CACAG	CACTA	CACTT	CACTC	CACTG	CACCA	CACCT	CACCC	CACCG	CACGA	CACGT	CACGC	CACGG
CAG	CAGAA	CAGAT	CAGAC	CAGAG	CAGTA	CAGTT	CAGTC	CAGTG	CAGCA	CAGCT	CAGCC	CAGCG	CAGGA	CAGGT	CAGGC	CAGGG
CTA	CTAAA	CTAAT	CTAAC	CTAAG	CTATA	CTATT	CTATC	CTATG	CTACA	CTACT	CTACC	CTACG	CTAGA	CTAGT	CTAGC	CTAGG
CTT	CTTAA	CTTAT	CTTAC	CTTAG	CTTTA	CTTTT	CTTTC	CTTTG	CTTCA	СТТСТ	CTTCC	CTTCG	CTTGA	CTTGT	CTTGC	CTTGG
CTC	CTCAA	CTCAT	CTCAC	CTCAG	СТСТА	CTCTT	СТСТС	CTCTG	CTCCA	СТССТ	СТССС	CTCCG	CTCGA	CTCGT	CTCGC	CTCGG
CTG	CTGAA	CTGAT	CTGAC	CTGAG	CTGTA	CTGTT	CTGTC	CTGTG	CTGCA	CTGCT	CTGCC	CTGCG	CTGGA	CTGGT	CTGGC	CTGGG
CCA	CCAAA	CCAAT	CCAAC	CCAAG	CCATA	CCATT	CCATC	CCATG	CCACA	CCACT	CCACC	CCACG	CCAGA	CCAGT	CCAGC	CCAGG
CCT	CCTAA	CCTAT	CCTAC	CCTAG	CCTTA	CCTTT	CCTTC	CCTTG	CCTCA	CCTCT	CCTCC	CCTCG	CCTGA	CCTGT	CCTGC	CCTGG
CCC	CCCAA	CCCAT	CCCAC	CCCAG	CCCTA	CCCTT	CCCTC		CCCCA	CCCCT	CCCCC	CCCCG	CCCGA	CCCGT	CCCGC	CCCGG
CCG	CCGAA	CCGAT	CCGAC	CCGAG	CCGTA	CCGTT	CCGTC	CCGTG	CCGCA	CCGCT	CCGCC	CCGCG	CCGGA	CCGGT	CCGGC	CCGGG
CGA	CGAAA	CGAAT	CGAAC	CGAAG	CGATA	CGATT	CGATC	CGATG	CGACA	CGACT	CGACC	CGACG	CGAGA	CGAGT	CGAGC	CGAGG
CGT	CGTAA	CGTAT	CGTAC	CGTAG	CGTTA	CGTTT	CGTTC	CGTTG	CGTCA	CGTCT	CGTCC	CGTCG	CGTGA	CGTGT	CGTGC	CGTGG
CGC	CGCAA	CGCAT	CGCAC	CGCAG	CGCTA	CGCTT	CGCTC	CGCTG	CGCCA	CGCCT	CGCCC	CGCCG	CGCGA	CGCGT	CGCGC	CGCGG
CGG	CGGAA	CAAAT	CAAAC	CGGAG	CGGTA	COATT	CGGTC	CGGTG	CGGCA	CGGCT	CGGCC	CGGCG	CGGGA	CGGGT	CGGGC	CGGGG
GAA	GAAAA	GAAAT	GAAAC	GAAAG	GAATA	GAATT	GATTC	GAATG	GAACA	GAACT	GAACC	GAACG	GAAGA	GAAGT	GAAGC	GAAGG
GAT	GATAA	GATAT	GATAC	GATAG	GATTA	GATTT	GATTC	GATTG	GATCA	GATCT	GATCC	GATCG	GATGA	GATGT	GATGC	GATGG
GAC	GACAA	GACAT	GACAC	GACAG	GACTA	GACTT	GACTC	GACTG	GACCA	GACCT	GACCC	GACCG	GACGA	GACGT	GACGC	GACGG
GAG	GAGAA	GAGAT	GAGAC	GAGAG	GAGTA	GAGTT	GAGTC	GAGTG	GAGCA	GAGCT	GAGCC	GAGCG	GAGGA	GAGGT	GAGGC	GAGGG
GTA	GTAAA	GTAAT	GTAAC	GTAAG	GTATA	GTATT	GTATC	GTATG	GTACA	GTACT	GTACC	GTACG GTTCG	GTAGA	GTAGT	GTAGC	GTAGG
STT STC	GTTAA GTCAA	GTTAT GTCAT	GTTAC GTCAC	GTTAG GTCAG	GTTTA GTCTA	GTTTT GTCTT	GTTTC GTCTC	GTTTG GTCTG	GTTCA GTCCA	GTTCT GTCCT	GTTCC GTCCC	GTCCG	GTTGA GTCGA	GTTGT GTCGT	GTTGC GTCGC	GTTGG GTCGG
TG	GTGAA	GTGAT	GTGAC	GTGAG	GTGTA	GTGTT	GTGTC	GTGTG	GTGCA	GTGCT	GTGCC	GTGCG	GTGGA	GTGGT	GTGGC	GTGGG
GCA	GCAAA	GCAAT	GCAAC	GCAAG	GCATA	GCATT	GCATC	GCATG	GCACA	GCACT	GCACC	GCACG	GCAGA	GCAGT	GCAGC	GCAGG
GCT	GCTAA	GCTAT	GCAAC	GCTAG	GCTTA	GCATT	GCTTC	GCTTG	GCTCA	GCACT	GCACC	GCACG	GCAGA	GCAGT	GCAGC	GCAGG
GCC	GCCAA	GCCAT	GCCAC	GCCAG	GCCTA	GCTTT	GCCTC	GCCTG	GCCCA	GCCCT	GCCCC	GCCCG	GCCGA	GCCGT	GCCGC	GCCGG
GCG	GCGAA	GCGAT	GCGAC	GCGAG	GCGTA	GCGTT	GCGTC	GCGTG	GCGCA	GCGCT	GCGCC	GCGCG	GCGGA	GCGGT	GCGGC	GCGGG
GGA	GGAAA	GGAAT	GGAAC	GGAAG	GGATA	GGATT	GGATC	GGATG	GGACA	GGACT	GGACC	GGACG	GGAGA	GGAGT	GGAGC	GGAGG
GGT	GGTAA	GGTAT	GGTAC	GGTAG	GGTTA	GGTTT	GGTTC	GGTTG	GGTCA	GGTCT	GGTCC	GGTCG	GGTGA	GGTGT	GGTGC	GGTGG
				GGCAG	GGCTA	GGCTT	GGCTC	GGCTG	GGCCA	GGCCT	GGCCC	GGCCG	GGCGA	GGCGT	GGCGC	GGCGG
GGC	GGCAA	GGCAT	GGCAC													

After filtering: read2: overrepresented sequences

Sampling rate: 1 / 20

Sampling rate: 1 / 20		
overrepresented sequence	count (% of bases)	distribution: cycle 1 ~ cycle 151
ACACACACACACACACACACACACACACACACAA	2703 (0.005294%)	
AC	87242 (0.170875%)	
ACACACACACACACACACACACACACACACACACACAC	722 (0.003535%)	
ACACACACACACACACACACACACACACACACACAG	2229 (0.004366%)	
AG	11728 (0.022971%)	
AGTGTGTGTGTGTGTGTGTGTGTGTGTGTG	25626 (0.050192%)	
ATGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTG	29225 (0.057241%)	
CACACACACACACACACACACACACACACAAA	2043 (0.004001%)	
CACACACACACACACACACACACACACACACACACA	54505 (0.106756%)	
CACACACACACACACACACACACACACACACACACACA	1027 (0.005029%)	
CACACACACACACACACACACACACACACACAGA	1324 (0.002593%)	
ccccccccccccc	6257 (0.006128%)	
стстстстстстстстстстстстстстстст	8502 (0.016652%)	
GA	10608 (0.020777%)	
GCACACACACACACACACACACACACACACACAC	38639 (0.075680%)	
GGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	25 (0.000049%)	
GTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	67 (0.000131%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTGA	1200 (0.002350%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	34491 (0.067555%)	
GTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGT	381 (0.001866%)	
тстстстстстстстстстстстстстстстс	10934 (0.021416%)	
TGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	59 (0.000116%)	
TGTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	23 (0.000045%)	
TGTGTGTGTGTGTGTGTGTGTGTGTGAG	1866 (0.003655%)	
тстстстстстстстстстстстстстстс	61330 (0.120123%)	
TGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTGTG	708 (0.003467%)	
TTGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGGG	36 (0.000071%)	

