- 1 -

piece 1, NC_000913, hybO_yghW+, config: linear, direction: +, begin: 3144254, end: 3144491

```
        *      *3144260  *        *3144270  *        *3144280  *        *3144290  *        *3144300  *        *3144310  *        *3144320  *        *3144330
5' a g a a t g g a t g a g g g t g t t a t c t c c a g t c a t t t a t a g t t a t t c c g t t g c g a a g a c c t g g c a t a t a t t t t g c c t c a a t c g c a a 3'
   - arg - met - asp - glu - gly - val - ile - ser - ser - his - leu -                    -fMet - pro - gln - ser - gln -
   - glu - trp - met - arg - val - leu - ser - pro - val - ile - tyr - ser - tyr - ser - val - ala - lys - thr - trp - his - ile - phe - cys - leu - asn - arg - lys -
     - asn - gly -                                           -fMet - arg - arg - pro - gly - ile - tyr - phe - ala - ser - ile - ala - lys -
... ------------------------------------------------------------] NC_000913.hybO
```
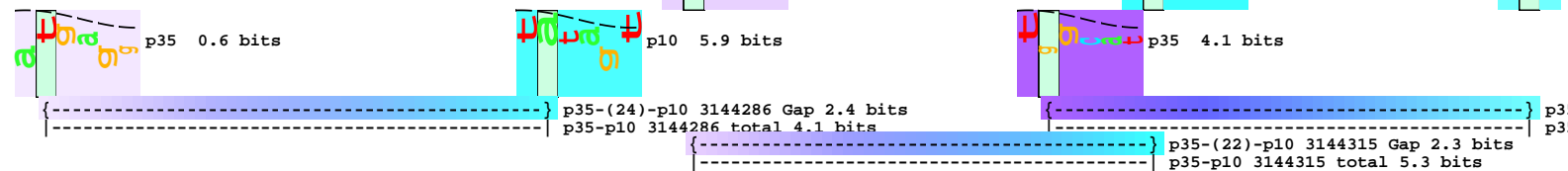
p35   1.2 bits   p10   6.5 bits   ... p10

p35   0.6 bits   p10   5.9 bits   p35   4.1 bits

{-------------------------------------} p35-(24)-p10 3144286 Gap 2.4 bits   {------------------------------------} p35-(23)-p10 3144333 Gap 1.4 bit
|-------------------------------------| p35-p10 3144286 total 4.1 bits |------------------------------------| p35-p10 3144333 total 7.4 bits

{----------------------------} p35-(22)-p10 3144315 Gap 2.3 bits
|----------------------------| p35-p10 3144315 total 5.3 bits

```
        *      *3144340  *        *3144350  *        *3144360  *        *3144370  *        *3144380  *        *3144390  *        *3144400  *        *3144410  *
5' a a t c a a t a a t g c g a t c g a t g c g c c a t t a c c a c a c a t t t a t t a t g g t t a t c g a t a t c a t g a t a c t g c g c g g g c t a a a 3'
   - asn - gln -                                           -fMet - val - ile - asp - ile - met - ile - leu - arg - arg - gly - ala - lys -
     - ile - asn - asn - ala - ile - asp - ala - pro - phe - thr - thr - his - leu - leu - trp - leu - ser - ile - ser -
     - ser - ile - met - arg - ser - met - arg - his - leu - pro - his - ile - tyr - tyr - gly - tyr - arg - tyr - his - asp - thr - ala - ala - gly - arg -
... p10   4.7 bits                                          sd                                          ir hybO_yghW+
```
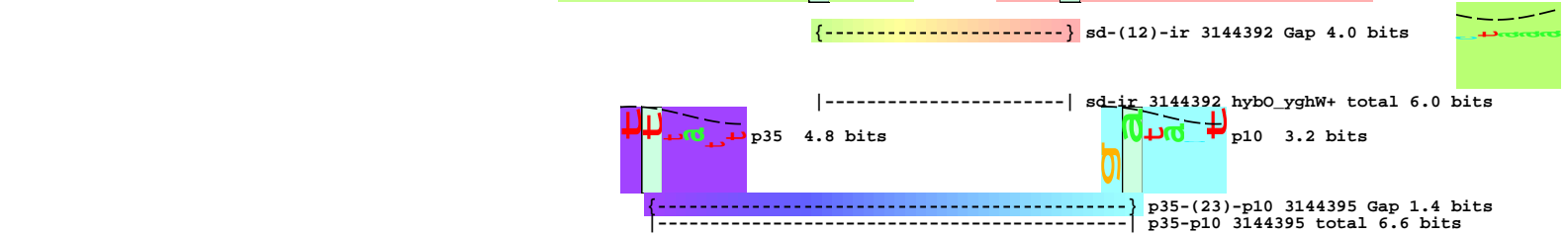
{----------------------------} sd-(12)-ir 3144392 Gap 4.0 bits   ... sd

|-------------------------| sd-ir 3144392 hybO_yghW+ total 6.0 bits

p35   4.8 bits   p10   3.2 bits

{----------------------------------} p35-(23)-p10 3144395 Gap 1.4 bits
|----------------------------------| p35-p10 3144395 total 6.6 bits

```
        *3144420  *        *3144430  *        *3144440  *        *3144450  *        *3144460  *        *3144470  *        *3144480  *        *3144490
5' a c g a a g g a a g a a g c a t t a g t g t a a t t a a t t a a a g t a a t a c g t a t g t t t g a t c a a t t t t c g a g g c g a t a a c 3'
   - thr - lys - gly - arg - ser - ile - ser - val - ile - asn -                    -fMet - phe - asp - gln - phe - ser - arg - arg -
                              -fMet -                                           -fMet - ile - asn - phe - arg - gly - asp - asn -
```
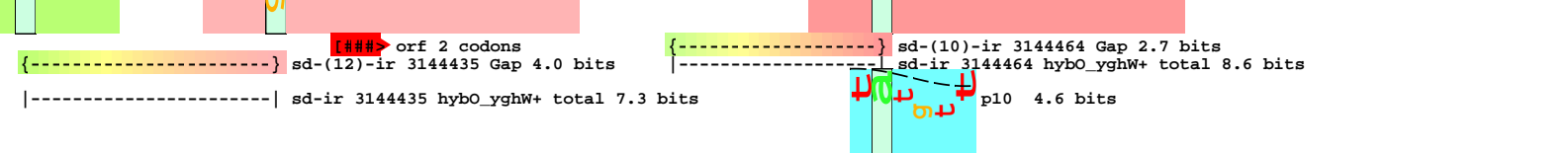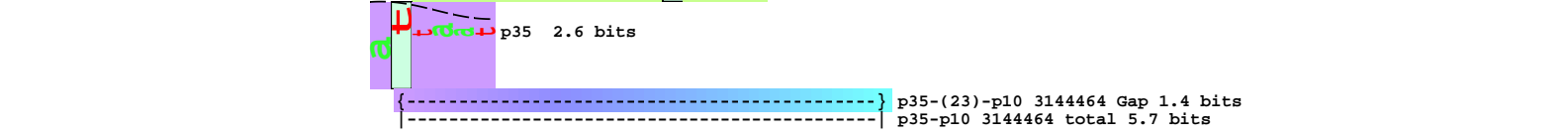   [###> orf 19 codons   <------------------------------------ ... NC_000913.yghW

... sd   ir hybO_yghW+   ir hybO_yghW+   [###> orf 9 codons

                    [###> orf 2 codons   sd-(10)-ir 3144464 Gap 2.7 bits

{-------------------->} sd-(12)-ir 3144435 Gap 4.0 bits |------------------| sd-ir 3144464 hybO_yghW+ total 8.6 bits

|---------------------| sd-ir 3144435 hybO_yghW+ total 7.3 bits   p10   4.6 bits

sd

p35   2.6 bits

{--------------------------------} p35-(23)-p10 3144464 Gap 1.4 bits
|--------------------------------| p35-p10 3144464 total 5.7 bits