**1.** If mRNA has a codon CAU, what is the corresponding anticodon on the tRNA molecule?

A. CAT

B. GUA

C. CAU

D. GTA

(Total 1 mark)

**2.** Which stage of translation is illustrated by the diagram below?

 

A. Termination

B. Initiation

C. Translocation

D. Elongation

(Total 1 mark)

**3.** Explain the process of translation.

(Total 9 marks)

**1.** B

[1]

**2.** D

[1]

**3.** 5' to 3' (direction of movement along mRNA);
(small subunit of) ribosome binds to mRNA;
moves along mRNA until it reaches the start codon /
AUG / translation starts at AUG;
tRNA binds to ribosome / mRNA;
large subunit binds to small subunit;
two tRNAs bound to ribosome at the same time;
binding of tRNA with anticodon complementary
to codon on mRNA;
tRNAs carry an amino acid;
anticodon / codon codes for an amino acid;
amino acid linked by a peptide bond to the polypeptide /
to another amino acid;
ribosome moves on along the mRNA;
tRNA displaced and another attaches to vacant binding site;
stop codon reached;
polypeptide / protein is released /
tRNA and mRNA detached from ribosome;
ribosome splits into (large and small) subunits;

[9]