

R	A	O	T	H	Y	M	I	N	E	V	P
E	F	P	Q	L	A	N	R	E	T	N	I
A	P	U	B	M	L	S	T	H	U	A	J
D	Y	A	M	I	N	O	A	C	I	D	U
I	M	C	N	O	I	E	L	A	R	A	M
N	S	K	Y	C	G	E	N	E	Q	N	E
G	T	R	H	T	O	X	S	T	O	P	N
F	A	I	U	T	O	D	V	E	J	Y	I
R	R	K	I	C	N	S	O	R	B	V	N
A	T	D	Y	A	D	E	I	N	A	C	E
M	E	M	O	N	E	G	L	N	F	I	D
E	S	R	G	U	A	N	I	N	E	L	A

Words can be in any direction:

1. **Nucleotide:** Term for the four building blocks of DNA
2. **Thymine:** (T) Chemical name for one of the four building blocks of DNA
3. **Adenine:** (A) Chemical name for one of the four building blocks of DNA
4. **Guanine:** (G) Chemical name for one of the four building blocks of DNA
5. **Cytosine:** (C) Chemical name for one of the four building blocks of DNA
6. **DNA:** The instruction manual that tells the cells in your body what to do
7. **Codon:** A group of 3 nucleotides that encodes an amino acid or stop codon
8. **Start:** A string of three nucleotides that signals the start of a protein
9. **Stop:** A string of three nucleotides that signals the end of a protein
10. **Internal:** In Genome Detectives we look for internal stop codons, which means protein manufacture will finish early and the protein will not be functional.
11. **Amino acid:** The building blocks of proteins
12. **Gene:** Section of DNA coding for a protein
13. **Reading frame:** One of three possible ways of dividing a sequence of nucleotides (A, T, G, C) into triplets
14. **Genome:** Complete set of genes or genetic material in an organism
15. **PubMLST:** A large database containing a dictionary of genes, linked to information about the bacteria the genes are found in.