

Task 3 glossary

Antibody: A protein produced by the immune system that is used to identify and neutralize foreign substances in the body.

APC: Allophycocyanin, a fluorescent protein used as a label in [immunostaining](#).

Fura2-AM: A dye that is used to measure intracellular calcium levels.

GFP: Green fluorescent protein, a protein that fluoresces green when exposed to certain wavelengths of light.

Immunofluorescence (immunostaining): A technique used to visualise specific proteins within cells or tissue using fluorescent dyes (typically conjugated with [antibodies](#) to specific proteins) and microscopy.

MAP2: Microtubule-associated protein 2, a protein that helps to stabilize microtubules and is expressed in mature neurons.

Mustard oil: A chemical that activates [TRPA](#) and is used as a stimulus to test the sensitivity of [nociceptor neurons](#).

NGN2: A [transcription factor](#) that is involved in the development of neurons.

Nociceptor neurons: A type of [sensory neuron](#) that detects and transmits signals related to pain.

NT3: Neurotrophin 3, a protein that promotes the survival and differentiation of neurons.

Sensory neurons: Nerve cells that detect stimuli and transmit signals to the central nervous system.

Transcription factor: A type of protein that regulates gene expression by binding to specific DNA sequences and activating or repressing the transcription of specific genes.

TRPA: Transient receptor potential ankyrin 1, a protein that is expressed in [nociceptor neurons](#) and is activated by certain painful stimuli.