Marks

Question 16 (8 marks)

(This question relates to the diagram on page 10.)

The owner of Cudgegong Farm wishes to spray the *Horse paddock* with a non-selective herbicide, before sowing a winter crop in February.

(a) Name TWO sensitive areas from the plan (one from an altitude higher than the *Horse paddock* and one from an altitude lower than the *Horse paddock*) that could be affected by the spraying activity.

Sensitive area at an altitude higher than the *Horse paddock*.

~~CREEK~~ Organic Olives. **1**

Sensitive area at an altitude lower than the *Horse paddock*.

CREEK - waterway leading to or from Dam. **1**

(b) For each area nominated in part (a), describe how the chemical could move to that area. **2**

wind could be the method which moves chemical residues to these two areas. Although there is a wind break between the Horse paddock + Organic olives, this might not be enough to control drift. The slope may cause chemical run off from horse paddock down to the creek if it rains soon after application.

(c) Describe TWO potential effects of chemical movement into the sensitive areas you have nominated. **2**

Chemical movement into organic olives would reduce value significantly to olives as organic farming does not allow ~~as~~ the use of any artificial chemicals.

Movement of chemicals into creek, or waterway could cause contamination harming environment of water way as well as the water contaminating irrigation water, when used, chemical may harm non target specie when water irrigated

(d) For one of the sensitive areas you have nominated, identify and analyse ONE control measure that will minimise the risk of the chemical impacting on that area. **2**

Chemical unpacking the organic olives could be minimised by ensuring a well structured buffer zone is created around organics ensuring chemical drift wont harm produce. There is a wind break in place, although ~~there~~ this may not be sufficient in minimising chemical movement.