

## **EXERCISE A: READING COMPREHENSION T3 (15 marks)**

**Read the following passage carefully and answer the questions below**

### **Differentiating Anxiety from Fear**

The revised reinforcement sensitivity theory (r-RST) postulates that fear and anxiety are two distinct neural affective systems (Gray & Mc Naughton, 2000). This hypothesis was based on extensive animal research using pharmacological approaches. Anxiety is thought to be related to defensive approach behaviour (comprising passive avoidance behaviour) whereas fear is hypothesized to be related to defensive active avoidance behaviour.

Stimuli that are new or ambiguous, that is, where the potential consequences are unclear, stimulate the behavioural inhibition system (BIS, the r-RST's proxy for anxiety) and lead to increased attention, risk assessment and checking of memory traces to investigate the potential threat of the stimuli. The BIS is also activated by all kinds of goal conflicts, including approach-avoidance and approach-approach conflicts. These conflicts represent uncertainty and are accompanied by feelings of anxiety. In contrast, the fear system is triggered by clear negative stimuli that need not be approached but simply have to be avoided, or escaped from.

Defensive avoidance comprises three potential defensive behavioural consequences: fight, flight and freeze (FFF-system, the r-RST's proxy for fear). The perceived distance from the threat crucially influences the choice of the respective behavioural alternatives. Freezing behaviour is activated if the perceived threat is close and impossible to escape. At a greater perceived distance of the threat and, if there is a possibility to escape, flight behaviour is elicited. However, when the threat is so close that flight is not possible and freezing is not an appropriate reaction, defensive threat occurs (such as vocalization and display of teeth or claws) followed by explosive defensive attack at zero distance to threat (i.e when nose-to-nose), that is, fight behaviour.

The hypothesis that fear and anxiety are distinct emotional systems is supported by experimental pharmacological work, demonstrating that only anxiety but not fear can be influenced by anxiolytic drugs (Gray & Mc Naughton, 2000).

Now answer the questions below using your own words. You may use derivation (i.e. change a noun into a verb or an adjective into a noun) but not lift full phrases. Your answer should not exceed 60 words. Write your answer in the box.

- 1) According to the authors' hypothesis, what type of behaviour is anxiety related to?

- 2) What stimulates the behavioural inhibition system (BIS)?

- 3) Explain 'flight behaviour is elicited'

- 4) Mention what the characteristics of fight behaviour are, as stated in the text above.

- 5) What supports the hypothesis that fear and anxiety are distinct emotional systems?