

MATRICULATION AND SECONDARY EDUCATION CERTIFICATE EXAMINATIONS BOARD
UNIVERSITY OF MALTA, MSIDA
MATRICULATION EXAMINATION
ADVANCED LEVEL
MAY 2013

SUBJECT:	PHILOSOPHY
PAPER NUMBER:	I
DATE:	21 st May 2013
TIME:	4.00 p.m. to 7.00 p.m.

Directions to Candidates

Answer **THREE** questions in all, **ONE** from **EACH** section. Questions carry equal marks.

Section A: Logic

1. (a) Comment on the adjective 'formal' in 'Formal Logic'.
- (b) Translate symbolically the following argument and check whether the implication involved is valid:

If John entered the football ground, he had a complementary ticket or he paid at the gate.
John entered the football ground and he did not have a complementary ticket.
Therefore, John paid at the gate.

- (c) (i) Write down two propositions \mathcal{A} and \mathcal{B} constructed out of the elementary propositions \mathbf{a} , \mathbf{b} , and \mathbf{t} and the logical particles \neg and \wedge and such that the first \mathcal{A} is true precisely when \mathbf{a} and \mathbf{t} are true and \mathbf{b} is false, and the second \mathcal{B} is true precisely when \mathbf{a} is true and \mathbf{b} and \mathbf{t} are false (see truth-tables underneath).
- (ii) Write down a proposition \mathcal{C} constructed out of the elementary propositions \mathbf{a} , \mathbf{b} and \mathbf{t} , the logical particles \neg , \wedge and \vee , and brackets, and whose truth-table is as underneath:

\mathbf{a}	\mathbf{b}	\mathbf{t}	\mathcal{A}	\mathcal{B}	\mathcal{C}
T	T	T	F	F	F
T	T	F	F	F	F
T	F	T	T	F	T
T	F	F	F	T	T
F	T	T	F	F	F
F	T	F	F	F	F
F	F	T	F	F	F
F	F	F	F	F	F

- (d) X and Y are formulae containing precisely a and b as primary formulae, such that X and $X \wedge Y$ have the following truth-tables:

a	b	X	$X \wedge Y$
T	T	F	F
T	F	T	T
F	T	F	F
F	F	T	F

Y has then one of four truth-tables. Write down these four truth-tables.

- (e) (i) What is meant by an **interpretation** of a formula?
 (ii) What is meant by a **model** of a formula?
- (f) The following proposition is true:
 "If it rained and Charlotte did not take an umbrella with her, she got wet."
 (i) Translate this proposition symbolically.
 (ii) **Contraposition** states that the implication $(A \wedge B) \rightarrow C \equiv (A \wedge \neg C) \rightarrow \neg B$ is valid. Write down **in words** a proposition which may be concluded from the original proposition by using Contraposition.
 (iii) Write down **in words** a proposition which may be concluded from the original proposition using **Transportation**.
- (g) (i) Work out by means of truth-tables whether the implication: $a \vee (b \wedge c) \equiv (a \vee b) \wedge (a \vee c)$ is valid.
 (ii) Dualise the implication above.
 (iii) State the duality principle.
 (iv) Use the Duality Principle to find out whether the answer to (g) (ii) is valid.
2. (a) Does the method of constructive logic consist in describing the way that words such as 'and', 'or' and 'if...then' are used in English? **Answer in not more than ten lines.**
- (b) Translate symbolically:
 (i) If Stephen did not go to visit his aunt, then he went to see a match or he went for a run.
 (ii) Stephen went to visit his aunt, and he went to see a match too, but he did not go for a run.
 (iii) Unless Stephen went to visit his aunt, then he went to see a match or he went for a run.
 (iv) Stephen went neither to visit his aunt, nor to see a match, nor for a run.
 (v) Stephen went to visit his aunt only if he did not go to see a match.

(c) (i) Which one of these propositions:

- (1) **a** and **b**, but not **c**
- (2) one and only one of **a**, **b** and **c**
- (3) neither **a** nor **b** nor **c**

has the following truth-table?

a	b	c	Proposition
T	T	T	F
T	T	F	F
T	F	T	F
T	F	F	T
F	T	T	F
F	T	F	T
F	F	T	T
F	F	F	F

(ii) Write down the truth-tables of the other two.

(d) Fill in the blanks in the following:

- (i) $A \rightarrow B$, $\underline{\hspace{2cm}}$ \ll $\underline{\hspace{2cm}}$ is valid (Modus Ponens)
- (ii) $A \rightarrow B$, $\underline{\hspace{2cm}}$ \ll $\underline{\hspace{2cm}}$ is valid (Modus Tollens)
- (iii) $A \ll B \vee C \Rightarrow \underline{\hspace{2cm}}$ is admissible (Contraposition)
- (iv) $A \ll B \vee C \Rightarrow \underline{\hspace{2cm}}$ is admissible (Transportation)
- (v) $\neg(A \wedge B) \gg \underline{\hspace{2cm}}$ is valid (De Morgan)
- (vi) $A \wedge (B \vee C) \gg \underline{\hspace{2cm}}$ is valid (Distribution)

(e) (i) Find out by means of truth-tables or otherwise whether the implication:
 $(\neg a \vee b) \wedge \neg b \ll \neg a$ is valid.

- (ii) Dualise the implication $(\neg a \vee b) \wedge \neg b \ll \neg a$.
- (iii) State the Duality Principle.
- (iv) Use the Duality Principle to find out whether the answer to (e) (ii) is valid.

(f) $A * B$ is defined by the following truth-table:

A	B	$A * B$
T	T	F
T	F	F
F	T	F
F	F	T

- (i) Work out the truth-tables of $A * A$, of $(A * B) * (A * B)$, and of $(A * A) * (B * B)$.
- (ii) Express $A \vee B$, $A \wedge B$, and $\neg A$ using only A's, B's, and *'s and brackets.
- (iii) Work out whether * is **associative**, i.e. whether $A * (B * C) \gg (A * B) * C$ is valid.
- (iv) Is any one of the implications in the equivalence in (f)(iii) valid? If so, which?

(g) Fill in the blanks:

- (i) For $\neg(\neg A \vee \neg B)$ to be true, the truth-value of $\neg A \vee \neg B$ must be _____.
- (ii) So the truth-value of $\neg A$ must be _____.
- (iii) So A must be _____.
- (iv) For $A \vee B$ to be false, A must be _____.
- (v) So it cannot be the case that $\neg(\neg A \vee \neg B)$ is true and $A \vee B$ false, because _____.
- (vi) That is, there are no counterinterpretations to the implication _____, which is therefore valid.

Section B: Philosophy of Language

- 3. In Peter Serracino Inglott's *Peopled Silence* language is described as a human medium. What does this description imply?
- 4. Give a general outline of David Cooper's views on meaning. Develop your essay by making particular reference to (i) the claim that 'meaning is a matter of belonging to a life' and (ii) the concept of 'appropriateness'.

Section C: History of Philosophy

- 5. Say briefly why it is said that Descartes starts a new, scientific philosophy. Your essay should: (i) include an outline of his philosophy and (ii) explain the place of doubt and certainty in his *Method*.

Fil-qosor, għid għala jingħad li Descartes jibda filosofija ġdida, filosofija xjentifika. L-essay għandu: (i) jagħti rendikont tal-filosofija tiegħu u (ii) jispjega r-rwol tad-dubju u ċ-ċertezza fil-*Metodu* tiegħu.

- 6. 'In Hume, philosophical empiricism leads to philosophical scepticism.' Discuss this claim by giving an account of Hume's philosophy. In your answer make sure you discuss: causality, substance, and personal identity.

'Fi Hume, l-empiriżmu filosofiku jwassal għal xetticiżmu filosofiku.' Iddiskuti din l-istqarrija billi tagħti rendikont tal-filosofija ta' Hume. Fit-twegiba tiegħek ara li tiddiskuti: il-kawżalità, is-sustanza, u l-identità personali.

SUBJECT:	PHILOSOPHY
PAPER NUMBER:	II
DATE:	22 nd May 2013
TIME:	4.00 p.m. to 7.00 p.m.

Answer **THREE** questions in all, **ONE** from **EACH** section. Questions carry equal marks.

Section A: Ethics

1. In *Fundamentals of Ethics*, John Finnis quotes Kant's statement: "Woe to those who creep through the serpent-windings of Utilitarianism" (p.120). Outline Finnis's discussion of Kantian ethics.
2. Discuss Gordon Graham's philosophical examination of hedonism.

Section B: Selected Texts I (Classical and Modern Texts)

3. Outline and discuss the main points of the argument in the *Phaedrus* regarding divine madness and the immortality of the soul.
4. Discuss Aristotle's views on the nature of moral goodness.
5. Outline J.S. Mill's main points in his argument for freedom of thought and expression.

Section C: Selected Texts II (Contemporary Texts)

6. Discuss Gilbert Ryle's concept of the will.
7. Briefly discuss J.L. Austin's theory of speech acts.
8. Charles Taylor argues that modernity is far from perfect. Outline his arguments and his suggested solutions.
9. Highlight the main arguments in Gadamer's essay 'The Speechless Image'.