**Model Question Paper (System Software IS61) for CIE test2**

**Instructions to Candidates: i) PART A will contain 10 questions (1 marks each) and PART B contains 10 questions (2 marks each). CIE Test will be for 30 marks MCQ. (part-A 10\*2+ part-B 10\*1= Total 30 Marks)**

**PART A-------------------------2 marks each Question**

1. Which is the object code of the following SIC/XE instruction – +**LDB#symb**, given that the value of symbol **symb** is 304A. The location counter of the instruction is 3035. Opcode of **LDB** instruction is 68.

( 2Marks)

1. 69100021
2. 6910304A
3. 6900304A
4. 69100018

Correct answer (b)

1. Which is the object code of the following SIC/XE instruction – **LDA** **#symb**. Given that the value of symbol **symb** is 304A. The location counter of the instruction is 3035. Opcode of **LDA** instruction is 00

( 2Marks)

1. 012013
2. 00304A
3. 003035
4. 012018

Correct answer (d)

3. A macro definition consists of (2 Marks)

a) A macro prototype statement

b) Macro calls

c) Assembly language instructions

d) All of the above

Correct answer (d)

4. A macro is ( 2Marks)

a) a small program inside a program

b) set of special instructions

c) a unit of specification for program generation through expansion

d) None of the above

Correct answer is (c)

5. The c file y.tab.c is created by the ................... command. (2 Marks)

a) yacc

b) lex

c) cc or gcc

d) ./a.out

e) All of the above

Correct answer is (a)

6. %{ ( 2 Marks)

int count =0;

%}

word [^ \t\n]+

%%

{word} { count++;}

%%

Indicate the value of count

a) Number of characters

b) Number of spaces and lines

c) Number of lines only

d) Number of words

Correct answer is (d)

7. Variable used as a input pointer to a file for a lex lexer is (2 marks)

a) yyin

b) yyinput

c) yylex

d) yytext

Correct answer is (a)

8. .................... is the standard yacc error routine. ( 2 marks)

a) yyerr()

b) yywrap()

c) yyerror()

d) yye()

Correct answer is (c)

9. The linker is (2 Marks)

a) Same as the loader

b) It is required to create a load module

c) is always used before programs are executed.

d) All of the above

Correct answer is (b)

10. In a two pass assembler the object code generation is done during the (2 Marks)

a) Second Pass

b) First pass

c) Not done by assemblers

d) loading phase

Correct answer is (a)

**PART B-------------------------1 mark each Questions**

1. In a two pass assembler, code generation is done during (1 Mark)

a) First Pass

b) Second Pass

c) Preprocessing

d) All of the above

Correct answer (b)

1. In which addressing mode the effective address of the operand is generated by adding a constant value to the content of register (1 Mark)
2. Absolute mode
3. Immediate mode
4. Indirect mode
5. Index mode

Correct answer (d)

3. A system program that combines the separately assembled/compiled modules of a program into a form suitable for execution? (1 Mark)

a) Assembler

b) Linking loader

c) Load and Go

d) None of the above

Correct answer (b)

4. A computer cannot boot if it does not have the (1 Mark)

a) Compiler

b) Loader

c) Operating System

d) Assembler

Correct Answer (b)

5. A ----------statement declares the name of the macro ( 1 Mark)

a) Macro prototype

b) Macro definition

c) Macro identification

d) None of the above

Correct answer (a)

6. The YACC takes C code as input and outputs\_\_\_\_\_\_\_\_\_ (1 Mark)  
a) Top down parsers  
b) Bottom up parsers  
c) Machine code  
d) Tokens

Correct answer is (b)

7. The output of Lexical analyzer is (1 Mark)

a) Machine Code

b) Intermediate Code

c) Stream of tokens

d) Parse tree

Correct answer is (c)

8. Parsing is also known as ( 1 Mark)

a) Lexical Analysis

b) Syntax Analysis

c) Semantic Analysis

d) Code generation

Correct answer is (b)

9. The grammer in the YACC program is defined in ( 1Mark)

a) definition section

b) Rules section

c) User subroutine section

d) Action section

Correct answer is (b)

10. In which addressing mode the operand is given explicitly in the instruction. ( 1mark)

a) Absolute mode

b) Immediate mode

c) Indirect mode

d) Index mode

e) None of the above

Correct answer is (b)