

CS111 FALL 2019 Lab Quiz 1

NAME _____ CUNYID _____

SECTION 1 – General 3 Points Each

1) What is the language that C/C++ programs are compiled into?

Machine Language(Assembly Language) _____

2) For which type of applications would I use a low-level language?

Those that need to be fast and/or small e.g. chip in a washing machine

SECTION 2 – Output 3 Points Each

Q1) what is the output?

```
double d = 1.234;
cout << d / 10 << " " << d / 100 << " " <<
    d * 10 << " " << d * 100 << endl;
```

Q1 0.1234 0.01234 12.34 123.4

Q2)

```
double d2 = 1.234;
int i = d2;
d2 -= i;
cout << i << "." << d2*1000 << endl;
```

Q2 1.234 _____

Q3)

```
i = 2; i %= 2;
if (i)
    cout << "Line 1" << endl;
else
    cout << "Line 2" << endl;
```

Q3 Line 2 _____

Q4)

```
int j = 12.456;
j*=100;
cout << j << endl;
```

Q4 1200 _____

Q5)
char letter1 = 'a', letter2='D';
letter1++; letter2--;
cout << letter1 << letter2 << endl;
Q5 bC

Q6)
int i1 = 3, i2 = 4, i3 = 5;

if (i1 < i2) { /*Swap the values*/
 int temp = i1; i1 = i2; i2 = temp; }

if (i2 < i3) { /*Swap the values*/
 int temp = i2; i2 = i3; i3 = temp; }

if (i1 < i2) { /*Swap the values*/
 int temp = i1; i1 = i2; i2 = temp; }
cout << i1 << i2 << i3 << endl;
Q6 543

Q7)
srand(time(0));
if (5 + rand() % 10 > 14)
 cout << "Greater than 14" << endl;
else
 cout << "Less than 14" << endl;
Q7 Less than 14

Q8)
int number = 2 / 3;
number *= 3.0;
cout << number << " " << (2 / 3.0) * 3.0 << endl;
Q8 0 2

Q9)
double ten = 10; double twenty = 20; int thirty = 30;
cout << 1.5 * ten << " "
 << 1.5 * twenty
 << " "
 << 1.5 * thirty << endl;
Q9 15 30 45

SECTION 3 – Output 10 Points Each

P1)

// write a program that asks the user to enter a character
// tell the user whether the character is upper or lower case

```
int main()
{
    cout << "Enter a character between 'A' .. 'Z'";
    cout << " or 'a'..'z'" << endl;
    char c;
    cin >> c;
    if (c >= 'A'&& c <= 'Z')
        cout << "Character entered is Upper case"
            << endl;
    if (c >= 'a'&& c <= 'z')
        cout << "Character entered is Lower case"
            << endl;
    return(0);
}
```

P2)

// Write a program that asks the user to enter three different
// whole numbers. Tells the user which one is the smallest.

```
int main()
{
    if (x < y && x < z)
        cout << x << endl;

    if (y < x && y < z)
        cout << y << endl;

    if (z < x && z < y)
        cout << z << endl;

    return(0);
}
```

ASCII CHART

Dec	Hex	Oct	Chr	Dec	Hex	Oct	HTML	Chr	Dec	Hex	Oct	HTML	Chr	Dec	Hex	Oct	HTML	Chr
0	0	000	NULL	32	20	040	 	Space	64	40	100	@	@	96	60	140	`	`
1	1	001	Start of Header	33	21	041	!	!	65	41	101	A	A	97	61	141	a	a
2	2	002	Start of Text	34	22	042	"	"	66	42	102	B	B	98	62	142	b	b
3	3	003	End of Text	35	23	043	#	#	67	43	103	C	C	99	63	143	c	c
4	4	004	End of Transmission	36	24	044	$	\$	68	44	104	D	D	100	64	144	d	d
5	5	005	Enquiry	37	25	045	%	%	69	45	105	E	E	101	65	145	e	e
6	6	006	Acknowledgment	38	26	046	&	&	70	46	106	F	F	102	66	146	f	f
7	7	007	Bell	39	27	047	'	'	71	47	107	G	G	103	67	147	g	g
8	8	010	Backspace	40	28	050	((72	48	110	H	H	104	68	150	h	h
9	9	011	Horizontal Tab	41	29	051))	73	49	111	I	I	105	69	151	i	i
10	A	012	Line feed	42	2A	052	*	*	74	4A	112	J	J	106	6A	152	j	j
11	B	013	Vertical Tab	43	2B	053	+	+	75	4B	113	K	K	107	6B	153	k	k
12	C	014	Form feed	44	2C	054	,	,	76	4C	114	L	L	108	6C	154	l	l
13	D	015	Carriage return	45	2D	055	-	-	77	4D	115	M	M	109	6D	155	m	m
14	E	016	Shift Out	46	2E	056	.	.	78	4E	116	N	N	110	6E	156	n	n
15	F	017	Shift In	47	2F	057	/	/	79	4F	117	O	O	111	6F	157	o	o
16	10	020	Data Link Escape	48	30	060	0	0	80	50	120	P	P	112	70	160	p	p
17	11	021	Device Control 1	49	31	061	1	1	81	51	121	Q	Q	113	71	161	q	q
18	12	022	Device Control 2	50	32	062	2	2	82	52	122	R	R	114	72	162	r	r
19	13	023	Device Control 3	51	33	063	3	3	83	53	123	S	S	115	73	163	s	s
20	14	024	Device Control 4	52	34	064	4	4	84	54	124	T	T	116	74	164	t	t
21	15	025	Negative Ack.	53	35	065	5	5	85	55	125	U	U	117	75	165	u	u
22	16	026	Synchronous idle	54	36	066	6	6	86	56	126	V	V	118	76	166	v	v
23	17	027	End of Trans. Block	55	37	067	7	7	87	57	127	W	W	119	77	167	w	w
24	18	030	Cancel	56	38	070	8	8	88	58	130	X	X	120	78	170	x	x
25	19	031	End of Medium	57	39	071	9	9	89	59	131	Y	Y	121	79	171	y	y
26	1A	032	Substitute	58	3A	072	:	:	90	5A	132	Z	Z	122	7A	172	z	z
27	1B	033	Escape	59	3B	073	;	;	91	5B	133	[[123	7B	173	{	{
28	1C	034	File Separator	60	3C	074	<	<	92	5C	134	\	\	124	7C	174	|	
29	1D	035	Group Separator	61	3D	075	=	=	93	5D	135]]	125	7D	175	}	}
30	1E	036	Record Separator	62	3E	076	>	>	94	5E	136	^	^	126	7E	176	~	~
31	1F	037	Unit Separator	63	3F	077	?	?	95	5F	137	_	_	127	7F	177		Del