**Department of Electrical and Computer Engineering, NSU**

**CSE 115L: Fundamentals of Computer Programming (Section 4)**

**Lab 06 (If-else) Faculty: Rsl**

**If-else**

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| Basic syntax of if-else statement in C.  If ( **condition**){  Statements;  }else{  Statements;  } | Condition is a Boolean expression written with only relational operators or Boolean operator or combination of both. |

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| Relational operators |  |
| Op1 > Op2 | Op1 Greater than Op2 |
| op1 >= op2 | Op1 greater than or equal to op2 |
| op1 < op2 | Op1 less than op2 |
| op1 <= op2 | Op1 less than r equal to op2 |
| op1 == op2 | Op1 equal to op2 |
| op1 != op2 | Op1 not equal to op2 |

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| **Boolean operators** |  |
| **&&** | AND |
| **||** | Or |
| **!** | Not |

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| Example 1: any non 0 value is considered true | Ex-2 ( if else with relational operators only) |
| #include<stdio.h>  int main()  {  if(1){  printf("The statement is true!!\n"); }  return 0;  } | #include<stdio.h>  int main()  {  int i=5,j=4;  if(i>j)  printf("I= %d is greater than J= %d \n",i,j);  else  printf("J= %d is greater than I=%d \n",j,i );  return 0;  } |
| Ex-3(if-else with relational operators and Boolean operators combination) | Ex-4 ( checking odd or even number using method and if-else) |
| #include<stdio.h>  int main()  {  int num;  printf("Enter a number:");  scanf("%d",&num);  if(num>=90)  printf("Grade is A!");  else if(num>= 80 && num < 90)  printf("Grade is B!");  else if(num>=70 && num<80)  printf("Grade is C!");  else  printf("Fail!");  return 0;  } | #include<stdio.h>  int main()  {  int num,check;  printf("Enter a number:");  scanf("%d",&num);  if(num%2==0)  check=1;  else  check=0;  if(check==1)  printf("%d is even! \n",num);  else  printf("%d is odd! \n",num);  return 0;  } |
| **Nested-if else basic structure** | **Finding max of 3 num** |
| if( expression )  {  if( expression1 )  {  statement-block1;  }  else  {  statement-block 2;  }  }  else  {  statement-block 3;  } | #include <stdio.h>  int main( )  {  int a,b,c;  printf("enter 3 number:\n");  scanf("%d%d%d",&a,&b,&c);  //finding maximum number  if(a>b)  {  if( a > c)  printf("%d is greatest",a);  else  printf("%d is greatest",c);  }  else  {  if( b> c)  printf("%d is greatest",b);  else  printf("%d is greatest",c);  }  return 0;  } |