* **Answer to the Question no: 1**

Answer:

| #include<stdio.h>  **void** **square**(**int** number) {  printf("Square of %d is %d\n",number, number\*number);  }  **int** **main**() {   **int** number;  printf("Enter a Number: ");  //input a number from user  scanf("%d",&number);  //call function square which takes as input number and output number square  square(number);  **return** 0; } |
| --- |

* **Answer to the Question no: 2**

Answer:

| **char** **retChar**(**int** number, **double** double\_number) |
| --- |

Sample Code(like as below)

| #include<stdio.h> **char** **retChar**(**int** number, **double** double\_number) {  **char** c = number + double\_number ;  **return** c; }  **int** **main**() {  **int** number;  **double** double\_number;  scanf("%d",&number);  scanf("%f",&double\_number);  **char** c = retChar(number, double\_number);  printf("%c",c);  **return** 0; } |
| --- |

* **Answer to the Question no: 3**

Answer:

| #include<stdio.h>  **int** **gcd**(**int** a, **int** b) {  **while**(a !=0)  {  **int** rem = b%a;  b = a;  a = rem;  }  **return** b; } **int** **getGcd**(**int** n, **int** arr[]) {  **int** g = arr[0];  **for**(**int** i =1; i<n;i++)  {  g = gcd(arr[i],g);  }  **return** g; } **int** **main**() {  **int** n = 10;  **int** arr[n];  **for**(**int** i=0; i<n; i++)  {  scanf("%d", arr+i);  }  **int** g = getGcd(n,arr);  printf("%d",g);  **return** 0; } |
| --- |

* **Answer to the Question no: 4**

Answer:

| #include<stdio.h> **void** **makeSum**(**int** a, **int** b, **int** \*sum) {  \*sum = a+b; // printf("%d",\*sum); } **int** **main**() {  **int** a, b,sum; // int \*psum = &sum;  scanf("%d %d",&a,&b);  makeSum(a,b,&sum);  printf("%d",sum);   **return** 0; } |
| --- |

* **Answer to the Question no: 5**

| **int a = 10;  int b = 20;  int \*p = &a;  printf("%d %d %d\n", a, b, \*p);   \*p = 30;   printf("%d %d %d\n", a, b, \*p);   \*p = 20;   a = 50;   b = 10;   printf("%d %d %d\n", a, b, \*p);   p = &b;   printf("%d %d %d\n", a, b, \*p);   a = 20;   b = 100;   printf("%d %d %d\n", a, b, \*p);** |
| --- |

Answer:

**output of the upper code:**

| 10 20 10 30 20 30 50 10 50 50 10 10 20 100 100 Process returned 0 (0x0) execution time : 0.018 s |
| --- |

* **Answer to the Question no: 6**

Answer:

| #include<stdio.h>  **void** **makeNArray**(**int** n, **int** squares[]) {  **for**(**int** i=0; i<n; i++)  {  squares[i] = (i+1)\*(i+1);  } }  **int** **main**() {  **int** n;  scanf("%d",&n);  **int** squares[n];   makeNArray(n,squares);  **for**(**int** i=0; i<n; i++)  {  printf("%d ",squares[i]);  }   **return** 0; } |
| --- |

* **Answer to the Question no: 7**

Answer:

| #include<stdio.h> **void** **retTwoNumber**(**int** a,**int** b,**int** \*pa, **int** \*pb) {  \*pa = b;  \*pb = a;  } **int** **main**() {  **int** a, b, pa, pb;  scanf("%d %d",&a,&b);    //return a and b's value in pa and pb address  retTwoNumber(a,b,&pa,&pb);  printf("pa=b-> is %d and pb=a->%d",pa,pb);   **return** 0; } |
| --- |

In the **main()** function we call **retTwoNumber()**. And pass two integer numbers and two addresses. **retTwoNumber()** function return two number using two addresses &pa and &pb.

* **Answer to the Question no: 8**

Answer:

| #include<stdio.h> #include<string.h> **void** **stringCat**(**char** a[], **char** b[], **char** out[]) {  **int** i = 0, j = 0;  **while** (a[i] != '\0') {  out[j] = a[i];  i++;  j++;  }  i = 0;  **while** (b[i] != '\0') {  out[j] = b[i];  i++;  j++;  }  out[j] = '\0'; // puts(out); } **int** **main**() {  **char** a[101],b[101],out[203];  printf("Enter first string: ");  gets(a);   printf("Enter Second string: ");  gets(b);   stringCat(a,b,out);  puts(out); // printf("%s",out);   **return** 0; } |
| --- |

* **Answer to the Question no: 9**

Answer:

| #include<stdio.h> **int** **main**() {  **int** n;  printf("Enter the size of array: ");  scanf("%d",&n);   **int** arr[n];  **int** \*ptr;  ptr= &arr[n-1];  printf("\n%d number for array: ",n);  **for**(**int** i =0; i<n;i++)  {  scanf("%d",ptr);  ptr--;  }  **for**(**int** i=0; i<n;i++)  {  printf("%d ",arr[i]);  }    **return** 0; } |
| --- |

* **Answer to the Question no: 10**

Answer:

The **main()** is a **user-defined** function. It differs from other user-defined functions.

**main()** is responsible for starting **the execution and termination** of the program.

Where other user-defined functions are not responsible for starting the execution and termination of the program. A **main()** function is an entry point of the programming code to start its **execution**. If there is **no** **main function** in the program the program will **not execute**. Other hand, without other user-defined functions in the program the program will execute.