

```
//Implement data encryption and data decryption
```

```
#include <stdio.h>
```

```
int main()
```

```
{
```

```
    int i, x;
```

```
    char str[100];
```

```
    printf("\nPlease enter a string:\t");
```

```
    gets(str);
```

```
    printf("\nPlease choose following options:\n");
```

```
    printf("1 = Encrypt the string.\n");
```

```
    printf("2 = Decrypt the string.\n");
```

```
    scanf("%d", &x);
```

```
    //using switch case statements
```

```
    switch(x)
```

```
    {
```

```
    case 1:
```

```
        for(i = 0; (i < 100 && str[i] != '\0'); i++)
```

```
            str[i] = str[i] + 3; //the key for encryption is 3 that is added to ASCII value
```

```
        printf("\nEncrypted string: %s\n", str);
```

```
        break;
```

```
    case 2:
```

```
        for(i = 0; (i < 100 && str[i] != '\0'); i++)
```

```
            str[i] = str[i] - 3; //the key for encryption is 3 that is subtracted to ASCII value
```

```
        printf("\nDecrypted string: %s\n", str);
```

```
        break;
```

```
    default:
```

```
        printf("\nError\n");
```

```
    }
```

```
    return 0;
```

```
}
```