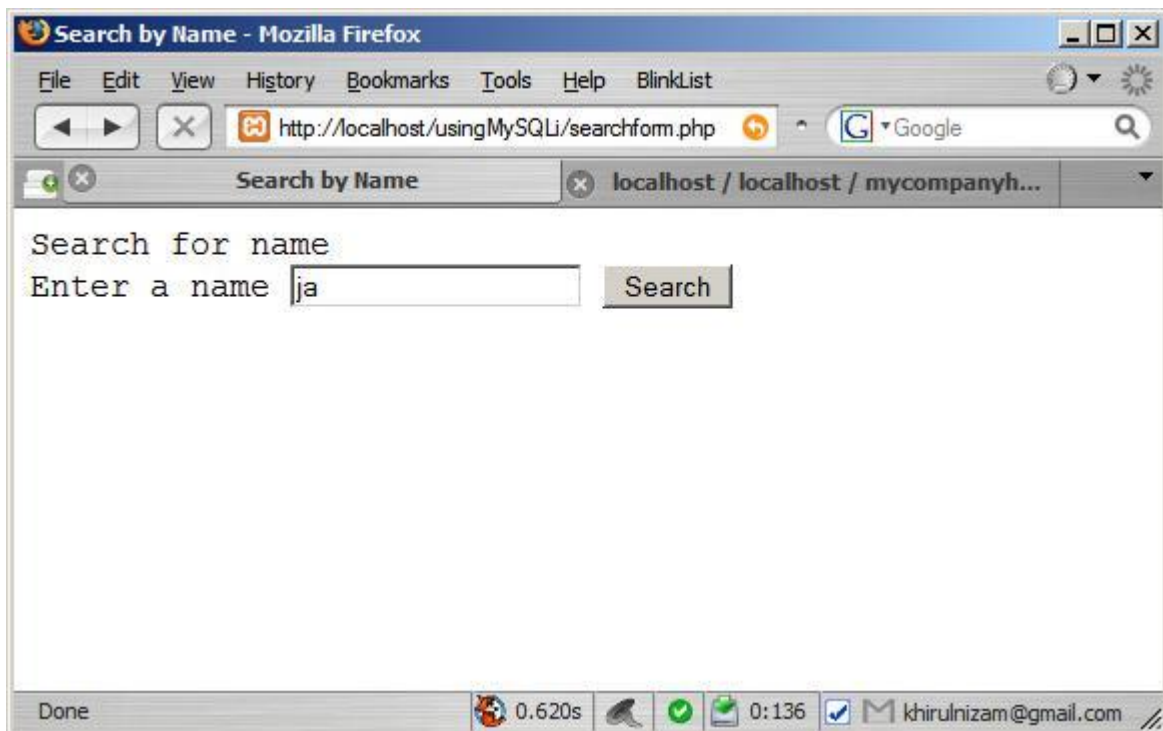**search record using SELECT**

Simple search

Create a HTML form to receive the user's request. In this example, we will be doing search based on the first name, from the table *employee* of the database *mycompanyhr*.

Create the file below, and save it as *searchform.php*.

```
<html>
<head>
<title>Search by Name</title>
</head>
<body>
Search for name<br>

<form action="simplesearch.php" method="get" name="formsearch">
Enter a name <input name="txtsearch" type="text">
<input name="btnsearch" type="submit" value="Search">
</form>

</body>
</html>
```

Create another file to receive the name entered by the user. The filename if you refer to the action attribute in the form is *simplesearch.php*.

```php
<html>
<head>
<title>Search by Name</title>
</head>

<body>
<?php
  $searchName=$_GET['txtsearch'];
  include ("connection.php");

  //Create SQL query, add WHERE clause to narrow listing
  $query="select EMPNO, FIRSTNAME, LASTNAME, WORKDEPT, PHONENO
          from employee
          where FIRSTNAME like '%$searchName%'";

  //Execute the query
  $qr=mysqli_query($db,$query);
  if($qr==false){
      echo ("Query cannot be executed!<br>");
      echo ("SQL Error : ".mysqli_error($db));
  }

  //Check the record effected, if no record,
  //display a message
  if(mysqli_num_rows($qr)==0){
      echo ("No record by that name: $searchName...<br>");
  }//end no record
  else{//there is/are record(s)
  ?>
  <b>Searching for <?=$searchName?></b><br>
  <table width="90%"  border="1">
  <tr align="center">
    <td>Employee no.</td>
    <td>First name</td>
    <td>Last name</td>
    <td>Department code</td>
    <td>Phone no.</td>
  </tr>

  <?php
     while ($rekod=mysqli_fetch_array($qr)){//redo to other records
  ?>
     <tr>
    <td><?=$rekod['EMPNO']?></td>
    <td><?=$rekod['FIRSTNAME']?></td>
    <td><?=$rekod['LASTNAME']?></td>
    <td><?=$rekod['WORKDEPT']?></td>
    <td><?=$rekod['PHONENO']?></td>
     </tr>
  <?php
     }//end of records
  ?>
```
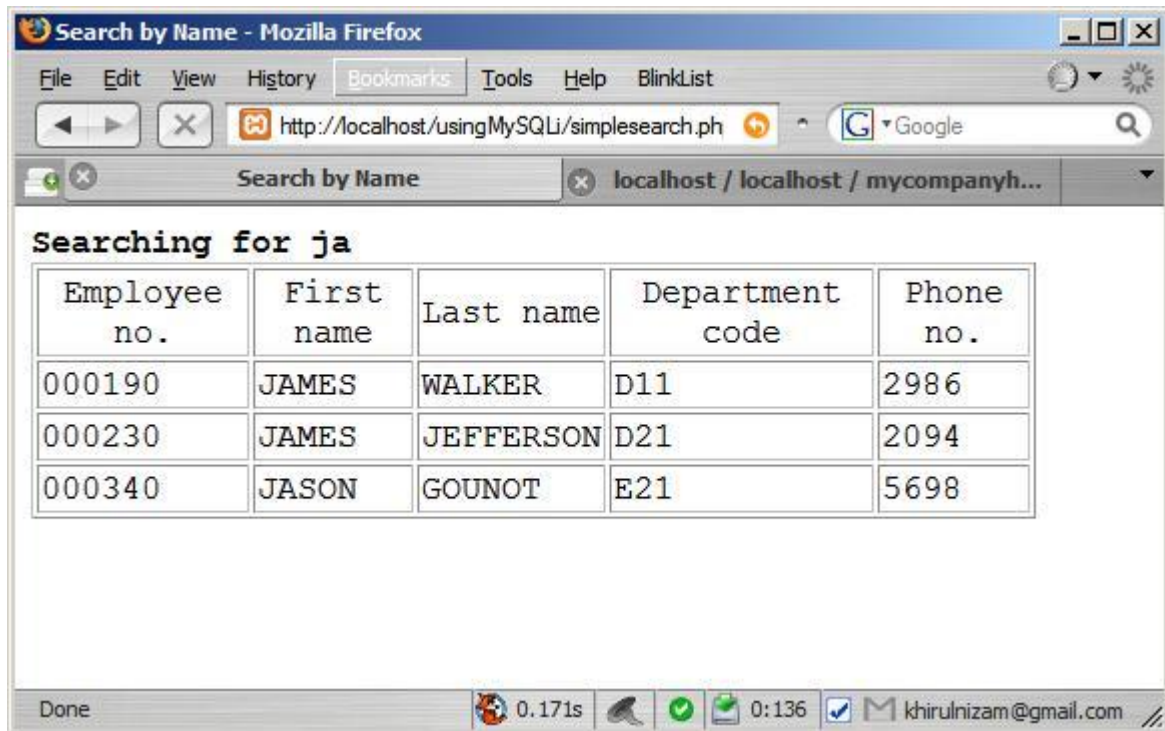
```
    </table>
    <?php
    }//end if there are records
?>
</body>
</html>
```

Combine search form and the search result

It's much more user friendly if we use a single page for the user's request and the record listing.

```
<html>
<head>
<title>Listing a Result Set in a Table</title>
</head>

<body>
Search for name<br>

<form action="simplesearch.php" method="get" name="formsearch">
Enter a name <input name="txtsearch" type="text">          1
<input name="btnsearch" type="submit" value="Search">
</form>

<?php
$searchName=$_GET['txtsearch'];          2
//this will execute if a name is inserted for search
if( $searchName!= NULL){          3
  //Include the connection details
  include ("connection.php");

  //Create SQL query, add WHERE clause to narrow listing
  $query="select EMPNO, FIRSTNAME, LASTNAME, WORKDEPT, PHONENO
          from employee
          where FIRSTNAME like '%$searchName%'";          4

  //Execute the query
  $qr=mysqli_query($db,$query);
  if($qr==false){
      echo ("Query cannot be executed!<br>");
      echo ("SQL Error : ".mysqli_error($db));
  }

  //Check the record effected, if no records,
  //display a message
  if(mysqli_num_rows($qr)==0){
      echo ("No record by that name: $searchName...<br>");
  }//end no record
  else{//there is/are record(s)
  ?>
  <b>Searching for <?=$searchName?></b><br>          5

  <table width="90%"  border="1">
  <tr align="center">
    <td>Employee no.</td>
    <td>First name</td>
    <td>Last name</td>
    <td>Department code</td>
    <td>Phone no.</td>
  </tr>
```

```php
<?php
   while ($rekod=mysqli_fetch_array($qr)){//redo to other records
?>
   <tr>
 <td><?=$rekod['EMPNO']?></td>
 <td><?=$rekod['FIRSTNAME']?></td>
 <td><?=$rekod['LASTNAME']?></td>
 <td><?=$rekod['WORKDEPT']?></td>
 <td><?=$rekod['PHONENO']?></td>
   </tr>
<?php
   }//end of records
?>
</table>
<?php
}//end if there are records

}//end if a name is inserted
?>
</body>
</html>
```

The legend for the number in circle in the previous script.
1.   The form for the user to enter the name to search.
2.   To extract the value entered in the textbox of the form in 1.
3.   If the value in 2 is NOT NULL (user keyed in some text), the search process will
        execute. If the value is NULL, then nothing will happen.
4.   Add the WHERE clause to select only the records that fulfill the condition.
5.   Just a simple output to display the name searched by the user.
And the rest of the script is very much similar to the listing procedure in Chapter 9.
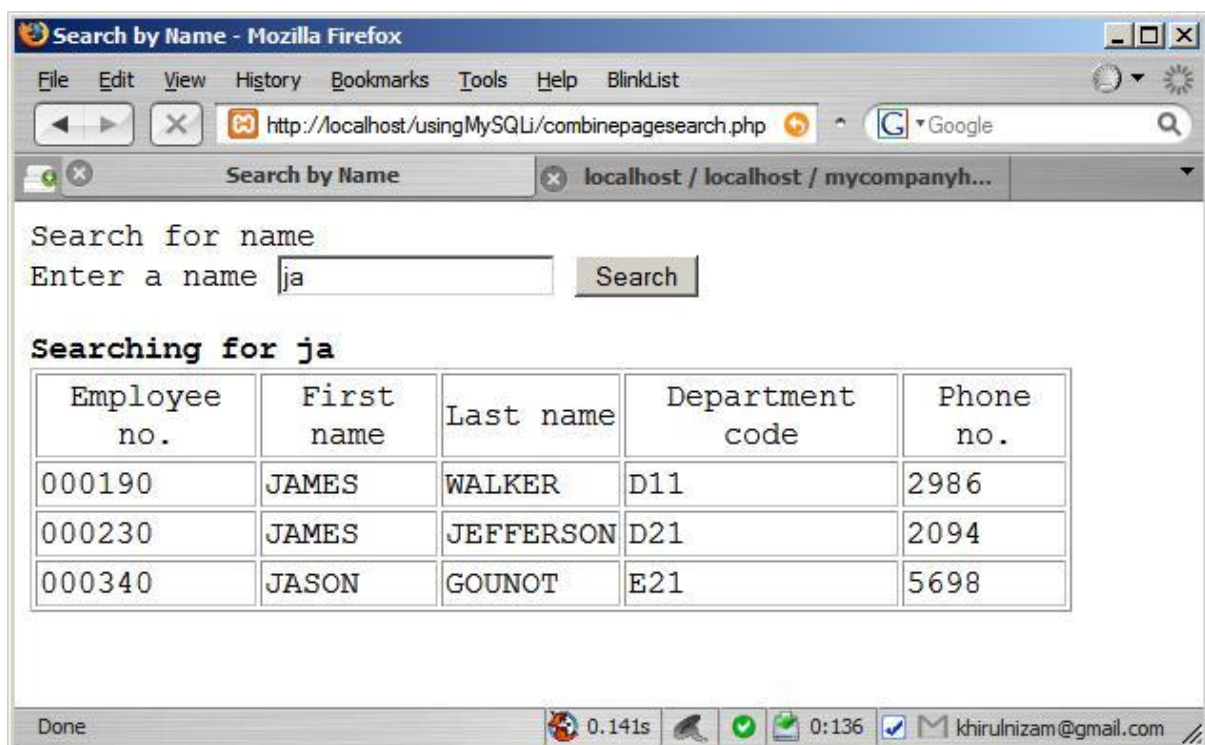
Search by using preferred criteria

To provide a much easier searching facility for the user, we can prepare a multiple option to choose. Instead of search by name only, user can choose search by their preferred field.

Create the form to receive user's query. Prepare a text box and a combo box/dropdown list. The drop down list will contain all criteria to choose.

This is the code for the form, save as *formsearchcriteria.php*.

```
<html>
<head>
<title>Search by Preferred Criteria </title>
</head>

<body>
Search for name<br>

<form action="selectcriteriasearch.php" method="get"
name="formsearch">
Enter a name <input name="txtsearch" type="text">
<?php
    //Include the connection details
    include ("connection.php");
    //list all the fields in the table employee
    $qfields="SHOW COLUMNS FROM employee";           1
    /*the sql query above will return only the fieldnames,
    without any record*/
?>
<select name="cmbfield">
<?php
    //create a combo box for list of fields
    $rsfield=mysqli_query($db,$qfields);
    while($field=mysqli_fetch_array($rsfield)){
      $fieldname=$field['Field'];
      echo "<option value='$fieldname'>$fieldname</option>\n";    2
}
?>
</select>

<input name="btnsearch" type="submit" value="Search">
</form>

</body>
</html>
```
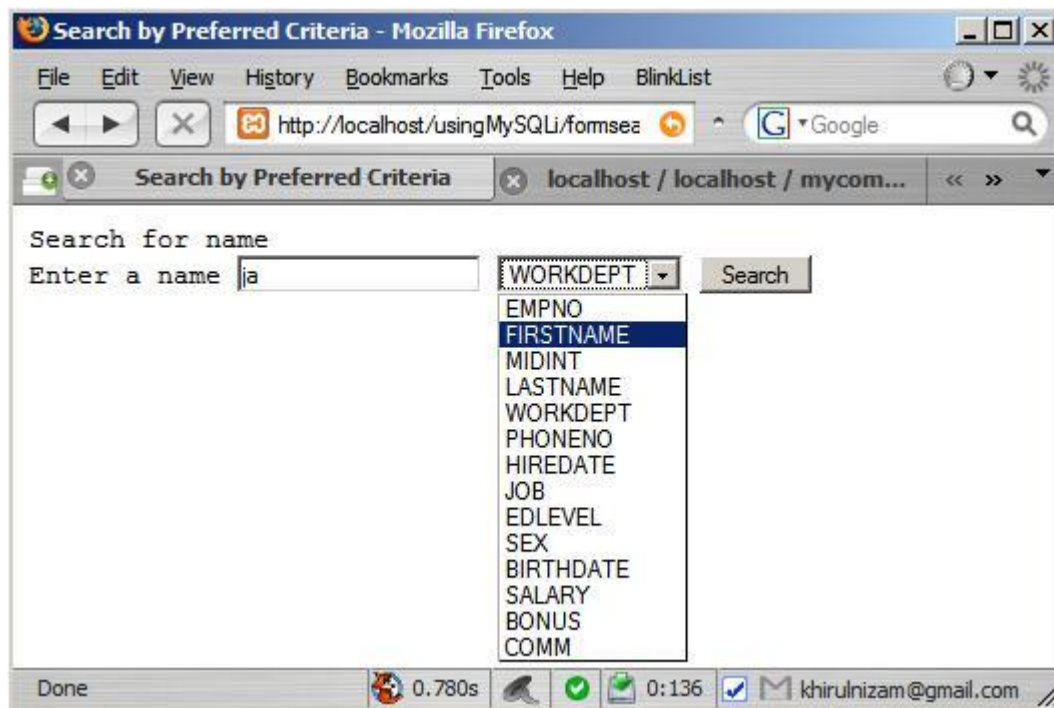
The legend for the number in circle in the previous script.
1.   This SQL clause is used to list all the fields from the *employee* table.
2.   Create the combo-box / drop-down-list, form the field list in 1, for the user to select their preferred criteria.

The file to process the user query is named *selectcriteriasearch.php*

```php
<html>
<head>
<title>List Searched Records by Preferred Criteria </title>
</head>


<body>
<?php
//fetch the search item
$searchitem=$_REQUEST['txtsearch'];
//fetch the search criteria
$searchcriteria=$_REQUEST['cmbfield'];

//Include the connection details
include ("connection.php");
  //Create SQL query, add WHERE clause to narrow listing
  $query="select EMPNO, FIRSTNAME, LASTNAME, WORKDEPT, PHONENO
          from employee
          where $searchcriteria like '%$searchitem%'";

  //Execute the query
  $qr=mysqli_query($db,$query);
  if($qr==false){
      echo ("Query cannot be executed!<br>");
      echo ("SQL Error : ".mysqli_error($db));
  }

  //Check the record effected, if no records,
  //display a message
  if(mysqli_num_rows($qr)==0){
      echo ("No record by that query: $searchitem...<br>");
  }//end no record
  else{//there is/are record(s)
```

```
  ?>
  <b>Searching for <?=$searchitem?> using
<?=$searchcriteria?></b><br>
  <table width="90%"  border="1">
  <tr align="center">
    <td>Employee no.</td>
    <td>First name</td>
    <td>Last name</td>
    <td>Department code</td>
    <td>Phone no.</td>
  </tr>


  <?php
    while ($rekod=mysqli_fetch_array($qr)){//redo to other records
  ?>
    <tr>
        <td><?=$rekod['EMPNO']?></td>
        <td><?=$rekod['FIRSTNAME']?></td>
        <td><?=$rekod['LASTNAME']?></td>
        <td><?=$rekod['WORKDEPT']?></td>
        <td><?=$rekod['PHONENO']?></td>
    </tr>
  <?php
    }//end of records
  ?>
  </table>
  <?php
  }//end if there are records
?>
</body>
</html>
```
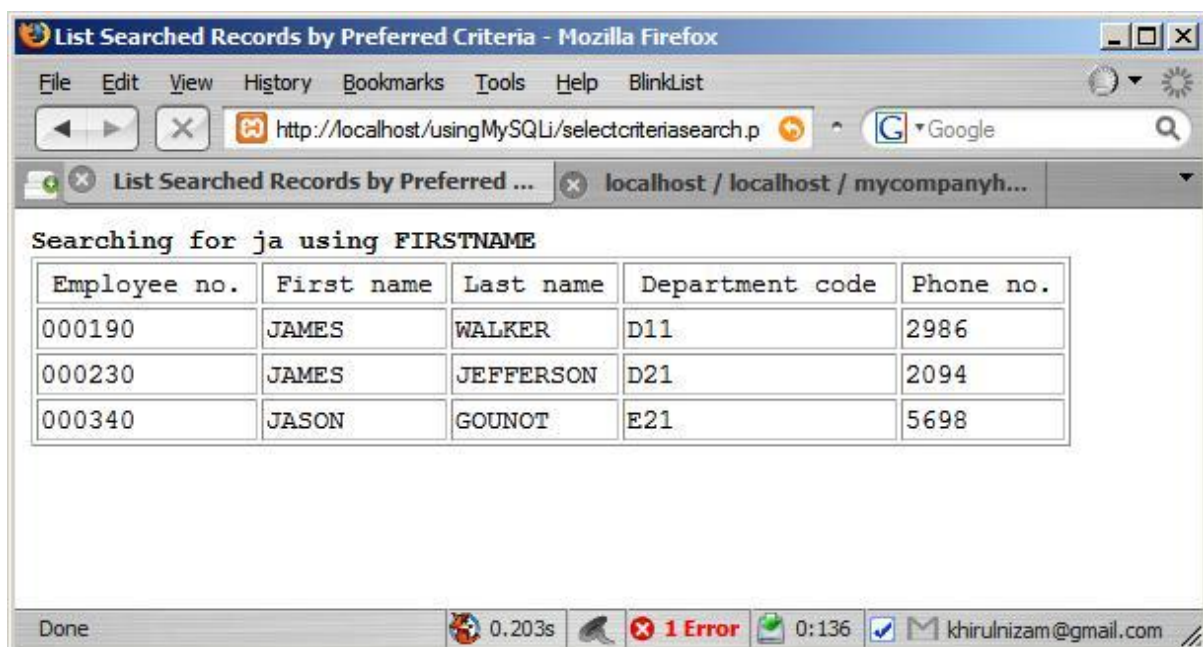
Search by using combination of criteria

Search the *employee* table with the combination of first name, hired year and gender. Create the first file to receive user's request, filename *formsearchcombinecriteria.php*.

```html
<html>
<head>
<title>Search by Combined Criteria </title>
</head>

<body>
Search for employee<br>

<form action="searchcombinecriteria.php" method="get"
name="formsearch">
Enter the first name <input name="txtfirstname" type="text"> AND
<br>
Choose the year hired
    <select name="cmbyearhired">
      <?php
            for ($i=1945;$i<=date('Y');$i++){
                echo "<option value='$i'> $i</option>";
            }
      ?>
      </select> AND <br>
Choose the gender
      <input name="rsex" type="radio" value="M"> Male
      <input name="rsex" type="radio" value="F"> Female
      <br>
<input name="btnsearch" type="submit" value="Search">
</form>

</body>
</html>
```
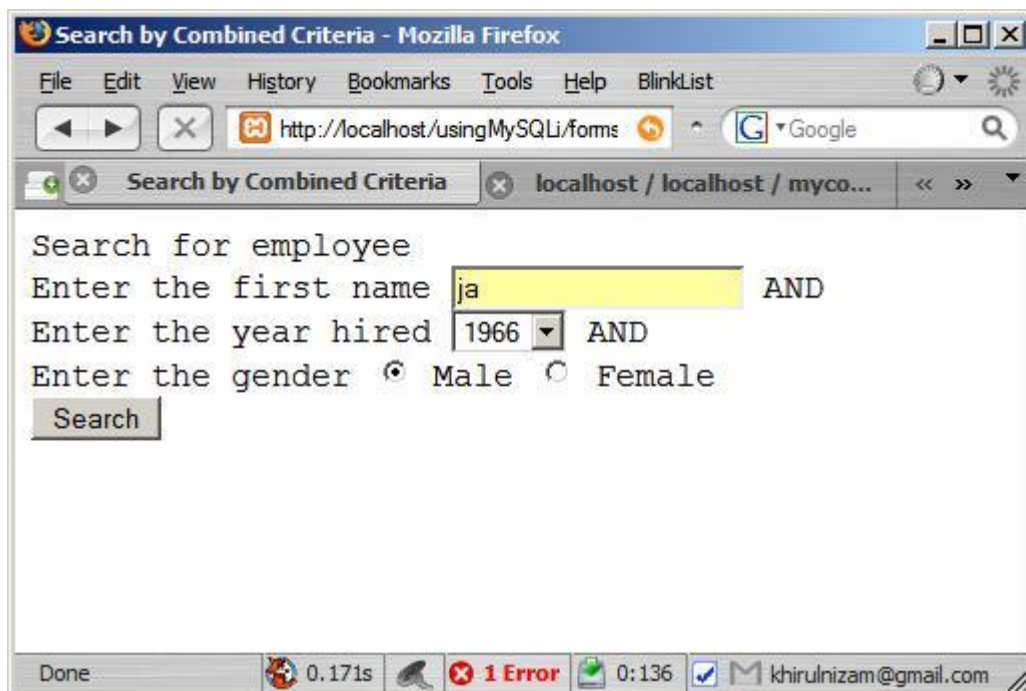
> This generates the year list from 1946 to the current year.

This is the page to receive the search criteria and list the match records. The filename is *searchcombinecriteria.php*.

```php
<html>
<head>
<title>List Searched Records by Combined Criteria </title>
</head>

<body>
<?php
$firstname=$_REQUEST['txtfirstname'];
$hiredyear=$_REQUEST['cmbyearhired'];
$sex=$_REQUEST['rsex'];

//Include the connection details
  include ("connection.php");
  //Create SQL query, add WHERE clause to narrow listing
  $query="select EMPNO, FIRSTNAME, LASTNAME, WORKDEPT, PHONENO,
          SEX, HIREDATE
          from employee
          where FIRSTNAME like '%$firstname%' AND
          year(HIREDATE) = '$hiredyear' AND
          SEX = '$sex'";
  //Execute the query
  $qr=mysqli_query($db,$query);
  if($qr==false){
      echo ("Query cannot execute!<br>");
      echo ("SQL Error : ".mysqli_error($db));
  }

  //Check the record effected, if no records,
  //display a message
  if(mysqli_num_rows($qr)==0){
      echo ("No record by that query...<br>");
  }//end no record
  else{//there is/are record(s)
  ?>
  <b>Searching for  combined criteria using
  <br>first name: <?=$firstname?>,
  hired year: <?=$hiredyear?> AND
  gender : <?=$sex?> .
  </b><br>
  <table width="90%"  border="1">
  <tr align="center">
    <td>Employee no.</td>
    <td>First name</td>
    <td>Last name</td>
    <td>Department code</td>
    <td>Phone no.</td>
  </tr>

  <?php
     while ($rekod=mysqli_fetch_array($qr)){//redo to other records
  ?>
     <tr>
```

```
            <td><?=$rekod['EMPNO']?></td>
            <td><?=$rekod['FIRSTNAME']?></td>
            <td><?=$rekod['LASTNAME']?></td>
            <td><?=$rekod['WORKDEPT']?></td>
            <td><?=$rekod['PHONENO']?></td>
        </tr>
    <?php
        }//end of records
    ?>
    </table>
    <?php
    }//end if there are records
?>
</body>
</html>
```