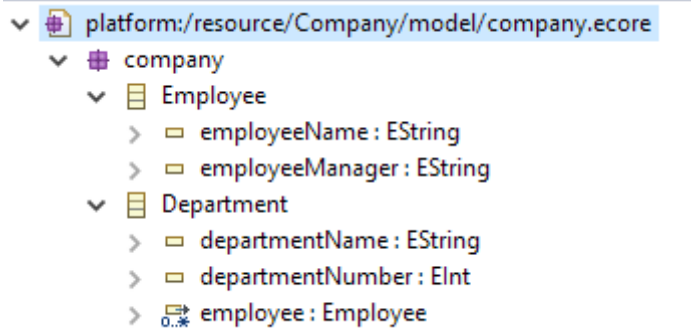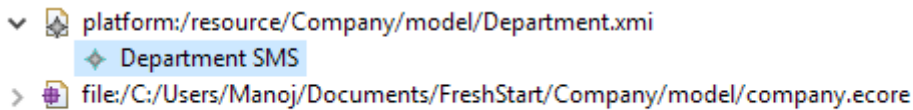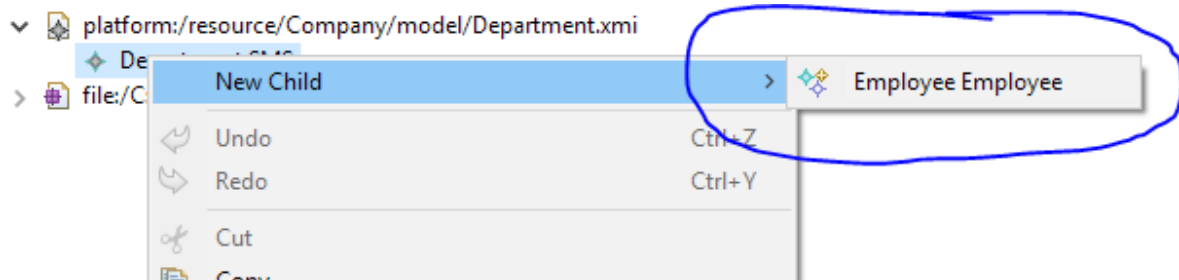Metamodel:

Ecore model:

Department model instance created programmatically:

Now I want to create this programmatically.

Here is my code:

```
public class DynamicTest extends TestCase
{
    public void testCreateModel() throws IOException {
    ResourceSet rs = new ResourceSetImpl();
    rs.getResourceFactoryRegistry().getExtensionToFactoryMap().put("ecore",
    new XMIResourceFactoryImpl());
    Resource res = rs.createResource( URI.createFileURI(
```

```
                "C:/Users/Manoj/Documents/FreshStart/Company/model/company.ecore" ));
        res.load(null);
        EPackage metapackage = (EPackage)res.getContents().get(0);
        System.out.println("meta Package "+metapackage.getName());
        EFactory employeeFactoryInstance = metapackage.getEFactoryInstance();
        EClass employeeClass = (EClass)metapackage.getEClassifier("Employee");
        EObject employeeObject = employeeFactoryInstance.create(employeeClass);
        EAttribute employeeName = employeeClass.getEAllAttributes().get(0);
        EAttribute employeeManager = employeeClass.getEAllAttributes().get(1);
        employeeObject.eSet(employeeName, "Manoj");
        employeeObject.eSet(employeeManager, "Albert");
        String empName = (String)employeeObject.eGet(employeeName);
        String empManager = (String)employeeObject.eGet(employeeManager);
        ResourceSet resourseSet = new ResourceSetImpl();
        resourseSet.getPackageRegistry().put(metapackage.getNsURI(),
        metapackage);

        ResourseSet.getResourceFactoryRegistry().getExtensionToFactoryMap().put
        ("*", new XMIResourceFactoryImpl());
        Resource resource =
        ResourseSet.createResource(URI.createURI("./model/Employee.xmi"));
        resource.getContents().add(employeeObject);
        Map options = new HashMap();
        options.put(XMIResource.OPTION_SCHEMA_LOCATION, Boolean.TRUE);
        try
        {
            resource.save(options);
        } catch (IOException e) {
            // TODO: handle exception
            e.printStackTrace();
        }
        EPackage metapackage1 = (EPackage)res.getContents().get(0);
        EFactory departmentFactoryInstance = metapackage1.getEFactoryInstance();
        EClass departmentClass =
        (EClass)metapackage1.getEClassifier("Department");
        EObject departmentObject =
        departmentFactoryInstance.create(departmentClass);
        EAttribute departmentName = departmentClass.getEAllAttributes().get(0);
        EAttribute departmentNumber =
        departmentClass.getEAllAttributes().get(1);
        EObject depRef = employeeClass.eContainmentFeature().eContents().get(0);
        departmentObject.eSet(departmentName, "SMS");
        departmentObject.eSet(departmentNumber, 101);
        String depName = (String)departmentObject.eGet(departmentName);
        Integer depNumber = (Integer)departmentObject.eGet(departmentNumber);
        ResourceSet resSet = new ResourceSetImpl();
        resSet.getPackageRegistry().put(metapackage1.getNsURI(), metapackage1);
        resSet.getResourceFactoryRegistry().getExtensionToFactoryMap().put("*",
        new XMIResourceFactoryImpl());
        Resource res1 =
        resSet.createResource(URI.createURI("./model/Department.xmi"));
        res1.getContents().add(departmentObject);
        Map options1 = new HashMap();
        options1.put(XMIResource.OPTION_SCHEMA_LOCATION, Boolean.TRUE);
        try
        {
            res1.save(options1);
        } catch (IOException e) {
            // TODO: handle exception
            e.printStackTrace();
        }
```

```
  }
}
```