

1. Create A new component which have news title(should print as h2), news detail(<p>), published date, source create this component using sling model.

The screenshot shows the CRXDE Lite web interface. The browser address bar displays `localhost:4502/crx/de/index.jsp#/apps/myTraining/components/news`. The left sidebar shows a tree view of the project structure, with `myTraining` expanded and `components` selected. The main editor area shows the `news.html` file with the following HTML code:

```
1 <div class="news-component">
2   <h2>${newsModel.newsTitle}</h2>
3   <p>${newsModel.newsDetails}</p>
4   <p class="published-date">${newsModel.publishedDate}</p>
5   <p class="news-source">Source: ${newsModel.newsSource}</p>
6 </div>
7
```

Below the editor, the 'Properties' tab is active, displaying a table of component properties:

Name	Type	Value	Protected	Mandatory	Multiple	Auto
1 componentGroup	String	My Training	false	false	false	fa
2 cq.styleClass	String	cop-news-com...	false	false	false	fa
3 jcr.created	Date	2025-03-25T0...	true	false	false	tr
4 jcr.createdBy	String	admin	true	false	false	tr
5 jcr.primaryType	Name	cq:Component	true	true	false	tr
6 jcr.title	String	News Compon...	false	false	false	fa
7 sling.resourceSuperType	String	core/wcm/com...	false	false	false	fa

At the bottom, there is a form to add new properties with fields for Name, Type, Value, and a 'Multi' checkbox, followed by an 'Add' button.

```
4 import org.apache.sling.models.annotations.Model;
5 import org.apache.sling.models.annotations.injectorspecific.ValueMapValue;
6
7 @Model(adaptables = Resource.class) no usages
8 public class NewsModel {
9
10     @ValueMapValue 1 usage
11     private String newsTitle;
12
13     @ValueMapValue 1 usage
14     private String newsDetail;
15
16     @ValueMapValue 1 usage
17     private String publishedDate;
18
19     @ValueMapValue 1 usage
20     private String newsSource;
21
22     public String getNewsTitle() { return newsTitle; } no usages
23     public String getNewsDetail() { return newsDetail; } no usages
24     public String getPublishedDate() { return publishedDate; } no usages
25     public String getNewsSource() { return newsSource; } no usages
26 }
```

ing > core > models > © NewsModel 8:14 CRLF UTF-8 4 spaces

## 2. Create multi field component(multiple news) using sling model fields: title of new and source of news

localhost:4502/crx/de/index.jsp#/apps/myTraining/components/multinews/cq%3A...

CRXDE Lite

Save All Create ... Delete Copy Paste Move ... Rename ... Overlay Node ... Mixins ... Tools admin@crx.default

/apps/myTraining/components/multinews/cq:dialog/content/items/newsItems

Home multinew.html

```
1 <div class="cop-news-component">
2   <h2>News List</h2>
3   <div data-sly-use.multiNews="com.myTraining.core.models.MultiNewsModel">
4     <sly data-sly-list.newsItem="${multiNews.newsList}">
5       <div class="news-entry">
6         <h2>${newsItem.newsTitle}</h2>
7         <p>${newsItem.newsDetail}</p>
8         <p style="color: black;">Published Date: ${newsItem.publishedDate}</p>
9         <p>Source: ${newsItem.source}</p>
10      </div>
11    </sly>
12  </div>
13 </div>
```

Properties Access Control Replication Console Build Info

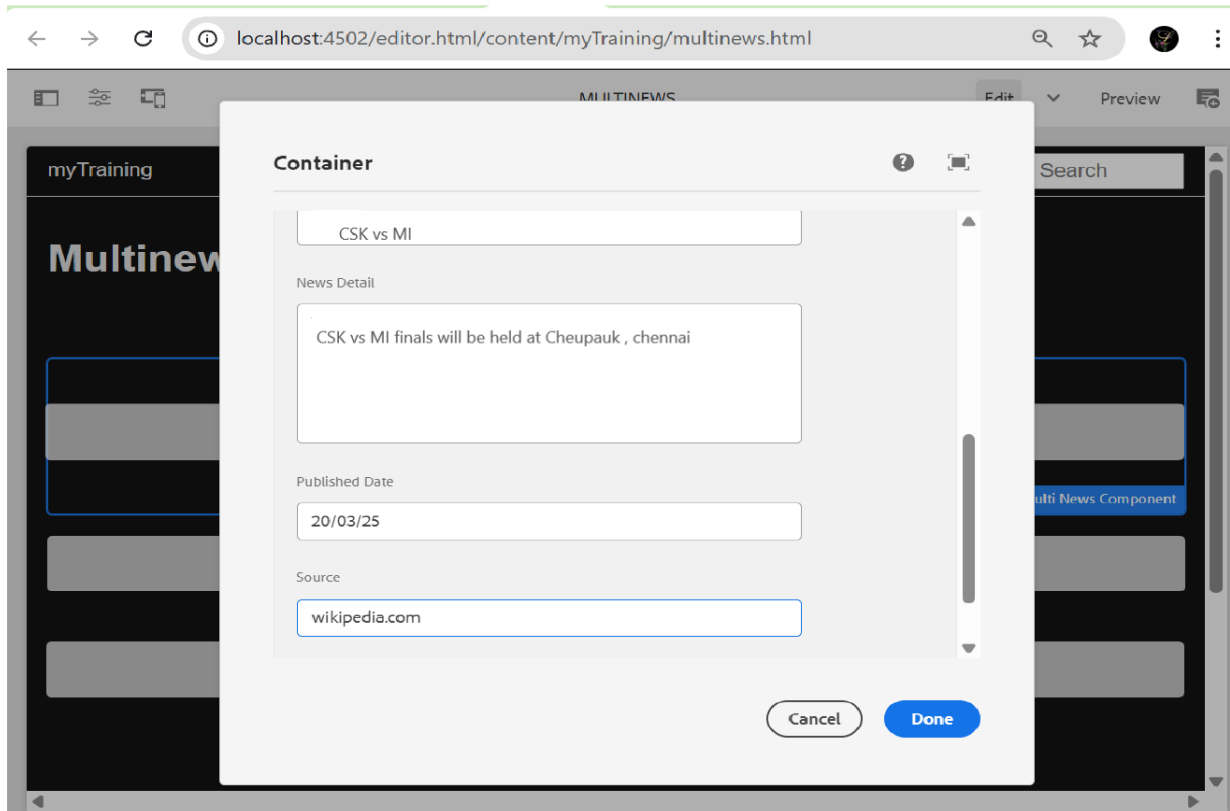
	Name	Type	Value	Protected	Mandatory	Multiple	Auto
1	composite	Boolean	true	false	false	false	false
2	fieldLabel	String	News Items	false	false	false	false
3	jcr:primaryType	Name	nt:unstructured	true	true	false	true
4	name	String	/newsItems	false	false	false	false
5	sling:resourceType	String	granite/ui/com...	false	false	false	false

localhost:4502/crx/de/index.jsp#

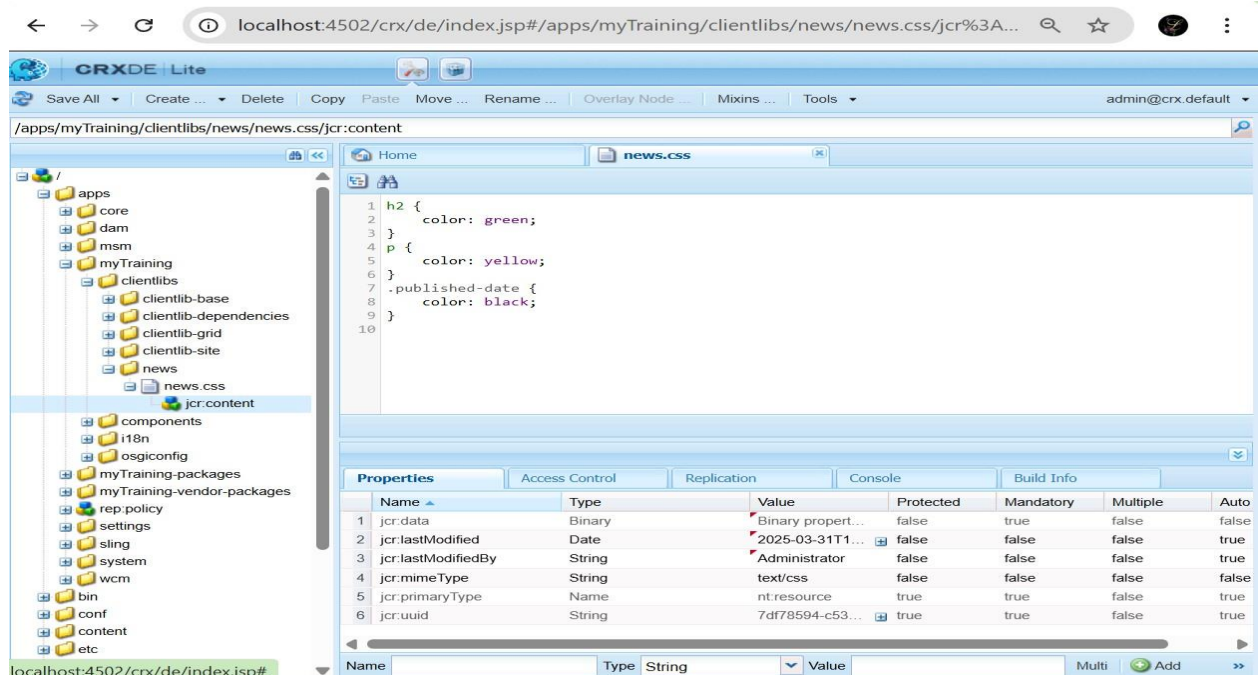
main.scss MultiNewsModel.java \_cq\_dialog\content.xml

```
13 public class MultiNewsModel {
18   public List<NewsItem> getNewsList() { no usages
19     return (newsList != null) ? newsList : new ArrayList<>();
20   }
21
22   public static class NewsItem { 2 usages
23     @ValueMapValue 1 usage
24     private String newsTitle;
25
26     @ValueMapValue 1 usage
27     private String newsDetail;
28
29     @ValueMapValue 1 usage
30     private String publishedDate;
31
32     @ValueMapValue 1 usage
33     private String source;
34
35     public String getNewsTitle() { no usages
36       return newsTitle;
37     }
38
39     public String getNewsDetail() { no usages
40       return newsDetail;
41     }
42   }
```

ing > core > models > MultiNewsModel 13:14 CRLF UTF-8 4 spaces



**3. Create clientlibs for news component and 4. Apply Green colour to the heading(h2) and yellow colour to news detail(<p) and date should be black in colour.**



**5. Add Component style to add custom style name (cop-news-component) in news component.**

```
ewsroom-template\content.xml  main.scss  MultiNewsModel.java  dialog.xml x  4  ^  v  @  m
2      <jcr:root xmlns:sling="http://sling.apache.org/jcr/sling/1.0" xmlns:cq="http:// 4 ^ v
5      <content jcr:primaryType="nt:unstructured">
6      <items jcr:primaryType="nt:unstructured">
26         <name value="newsSource"/>
27         <readMoreLink
28             jcr:primaryType="nt:unstructured"
29             sling:resourceType="granite/ui/components/coral/foundation/form/text:
30             fieldLabel="Read More Link"
31             name="readMoreLink"/>
32         <extraClientLibs
33             jcr:primaryType="nt:unstructured"
34             sling:resourceType="granite/ui/components/coral/foundation/form/hidd
35             name="cq:extraClientLibs"
36             value="cop-news-component"/>
37     </items>
38 </content>
39 </jcr:root>
40
```

> apps > myTraining > components > news > \_cq\_dialog > dialog.xml 40:1 CRLF UTF-8 4 spaces

**6. Create a base page component and add new file as metadata so that it can print og:title, og:description and og:image link that file in base page.html**

```
MultiNewsModel.java  dialog.xml  basepage.html x  newsroompage_cq_dialog\content.xml  7  ^  v  @  m
1      <sly data-sly-use="page"="com.adobe.cq.wcm.core.components.models.Page"/>
2      <html>
3      <head>
4          <title>${pageProperties.jcr:title}</title>
5
6          <!-- Open Graph Metadata -->
7          <meta property="og:title" content="${pageProperties.ogTitle @ context='html'}"/>
8          <meta property="og:description" content="${pageProperties.ogDescription @ context='h
9          <meta property="og:image" content="${pageProperties.ogImage @ context='html'}"/>
10
11          <sly data-sly-call="${page.head @ page=page}"/>
12      </head>
13      <body>
14          <sly data-sly-call="${page.body @ page=page}"/>
15      </body>
16      </html>
17
```

> apps > myTraining > components > page > basepage.html 17:1 CRLF UTF-8 4 spaces



## 7. Create custom page properties saying Global properties and 3 fields should be there as og:title, og :description and og:image path

```
\page\content.xml  </> page_cq_dialog\content.xml  x  <> newsroompage.html  </> template-types  v  :  @  m

2  <jcr:root  xmlns:sling="http://sling.apache.org/jcr/sling/1.0"  ✓ 3  ^  v
5  jcr:primaryType="nt:unstructured"
6  cq:dialogMode="floating"
7  cq:actions="[cancel,save]"
8  <content jcr:primaryType="nt:unstructured">
9    <globalProperties jcr:primaryType="nt:unstructured">
10      <ogTitle jcr:primaryType="nt:unstructured"
11        sling:resourceType="granite/ui/components/coral/foundation/form/textfield"
12        fieldLabel="OG Title"
13        name="./ogTitle"/>
14
15      <ogDescription jcr:primaryType="nt:unstructured"
16        sling:resourceType="granite/ui/components/coral/foundation/form/textfield"
17        fieldLabel="OG Description"
18        name="./ogDescription"/>
19
20      <ogImage jcr:primaryType="nt:unstructured"
21        sling:resourceType="granite/ui/components/coral/foundation/form/textfield"
22        fieldLabel="OG Image"
23        name="./ogImage"/>
24    </globalProperties>
25  </content>
26 </jcr:root>
27
```

## 8. What is extracientlib add it this multi field component

extraClientLibs is used to load additional client libraries for specific components.

```
1  <?xml version="1.0" encoding="UTF-8"?>  ✓ 4  ^  v  @  m
2  <jcr:root
3    xmlns:sling="http://sling.apache.org/jcr/sling/1.0"
4    xmlns:cq="http://www.day.com/jcr/cq/1.0"
5    xmlns:jcr="http://www.jcp.org/jcr/1.0"
6    jcr:primaryType="nt:unstructured"
7    cq:dialogMode="floating"
8    cq:actions="[cancel,save]"
9    cq:extraClientLibs="[myTraining.customJS]"
10
11  <content jcr:primaryType="nt:unstructured">
12    <items jcr:primaryType="nt:unstructured">
13      <newsItems jcr:primaryType="nt:unstructured"
14        sling:resourceType="granite/ui/components/coral/foundation/form/multifield"
15        fieldLabel="News Items"
16        composite="{Boolean}true"
17        name="./newsItems">
18
19        <field jcr:primaryType="nt:unstructured"
20          sling:resourceType="granite/ui/components/coral/foundation/container">
21
22          <items jcr:primaryType="nt:unstructured">
23            <newsTitle jcr:primaryType="nt:unstructured"
24              sling:resourceType="granite/ui/components/coral/foundation/form/textfield"
25              fieldLabel="News Title"
26              name="./newsTitle"/>
27
```