

Project for CRUD operations by using CBV's:

ListView	-->To list out all records information
DetailView	-->To get information about a particular object
CreateView	-->To insert/create a record into the database
UpdateView	-->To update a an existing record
DeleteView	-->To delete a particular record

Ex:

D:\Django_20MAR_7PM>django-admin startproject cbvproject3

D:\Django_20MAR_7PM>cd cbvproject3

D:\Django_20MAR_7PM\cbvproject3>py manage.py startapp testapp

-->Add app in settings.py

- **models.py**

```
class Company(models.Model):
    name = models.CharField(max_length=128)
    location = models.CharField(max_length=64)
    ceo = models.CharField(max_length=64)
```

-->Makemigrations and migrate

- **admin.py**

```
from testapp.models import Company
class CompanyAdmin(admin.ModelAdmin):
    list_display = ['name','location','ceo']
admin.site.register(Company,CompanyAdmin)
```

- **views.py**

```
from django.views.generic import ListView
from testapp.models import Company
class CompanyListView(ListView):
    model = Company
    #default template file name:company_list.html
    #default context object name:company_list
```

- **base.html**

```
<!DOCTYPE html>
<html lang="en" dir="ltr">
<head>
```

```

<meta charset="utf-8">
<title></title>
<link rel="stylesheet"
href="https://cdn.jsdelivr.net/npm/bootstrap@4.6.2/dist/css/bootstrap.min.cs
s" integrity="sha384-
xOolHFLEh07PJGoPkLv1IbcEPTNtaed2xpHsD9ESMhqIYd0nLMwNLD69Npy4HI+
N" crossorigin="anonymous">
</head>
<body>
<div class="container">
    {% block body_block %}
    {% endblock %}
</div>
</body>
</html>

```

- **company_list.html**

```

<!DOCTYPE html>
{% extends 'testapp/base.html' %}
{% block body_block %}
<h1>List of all companies</h1>
<ul>
    {% for company in company_list %}
    <li>{{company.name}}</li>
    <li>{{company.location}}</li>
    <li>{{company.ceo}}</li>
    {% endfor %}
</ul>
{% endblock %}

```

- **urls.py**

```

path("", views.CompanyListView.as_view()),

```

- **views.py**

```

class CompanyDetailView(DetailView):
    model = Company
    #default template file name:company_detail.html
    #default context object name:company or object

```

- **urls.py**

```
path('<int:pk>/', views.CompanyDetailView.as_view()),
```

- **company_list.html**

```
<!DOCTYPE html>
{% extends 'testapp/base.html' %}
{% block body_block %}
<h1>List of all companies</h1>
<ul>
  {% for company in company_list %}
  <li><a href="/{{company.id}}">{{company.name}}</a></li>
  {% endfor %}
</ul>
{% endblock %}
```

- **company_detail.html**

```
<!DOCTYPE html>
{% extends 'testapp/base.html' %}
{% block body_block %}
<h1>{{company.name}} Information</h1>
<ul>
  <h2><li>Company Name:{{company.name}}</li></h2>
  <h2><li>Company Location:{{company.location}}</li></h2>
  <h2><li>Company CEO:{{company.ceo}}</li></h2>
</ul>
{% endblock %}
```

- **views.py**

```
class CompanyCreateView(CreateView):
    model = Company
    fields = '__all__'
```

- **company_form.html**

```
<!DOCTYPE html>
{% extends 'testapp/base.html' %}
{% block body_block %}
<h1>Company Insert/Update Form </h1>
<form method="post">
  {{form.as_p}}
  {% csrf_token %}
```

```
<input type="submit" name="" value="Insert / Update Record">
</form>
{% endblock %}
```

- **urls.py**

```
path('create/', views.CompanyCreateView.as_view()),
```

ImproperlyConfigured at /create/

No URL to redirect to. Either provide a url or define a get_absolute_url method on the Model.

- **models.py**

```
from django.urls import reverse
```

```
# Create your models here.
```

```
class Company(models.Model):
```

```
    name = models.CharField(max_length=128)
```

```
    location = models.CharField(max_length=64)
```

```
    ceo = models.CharField(max_length=64)
```

```
    def get_absolute_url(self):
```

```
        return reverse('detail',kwargs={'pk':self.pk})
```

- **views.py**

```
class CompanyUpdateView(UpdateView):
```

```
    model = Company
```

```
    fields = ('location','ceo')
```

- **urls.py**

```
path('update/<int:pk>/', views.CompanyUpdateView.as_view()),
```

- **add update link in company_detail.html**

```
<a class="btn btn-warning" href="/update/{{company.id}}">Update
Record</a>
```

```
<a class="btn btn-success" href="/">Company List</a>
```

- **views.py**

```
from django.urls import reverse_lazy
```

```
class CompanyDeleteView(DeleteView):
```

```
    model = Company
```

```
    success_url = reverse_lazy('list')
```

- **urls.py**

```
path('delete/<int:pk>/', views.CompanyDeleteView.as_view()),
```

TemplateDoesNotExist at /delete/5/

testapp/company_confirm_delete.html

- **company_confirm_delete.html**

```
<!DOCTYPE html>
{% extends 'testapp/base.html' %}
{% block body_block %}
<h1>Do you want to really delete company:{{company.name}}???</h1>
<form method="post">
    {% csrf_token %}
    <input type="submit" class="btn btn-danger" name="" value="Delete
Record">
    <a class="btn btn-success" href="/{{company.id}}">Cancel</a>
</form>
{% endblock %}
```

- **company_detail.html**

```
<a class="btn btn-warning" href="/update/{{company.id}}">Update
Record</a>
<a class="btn btn-danger" href="/delete/{{company.id}}">Delete Record</a>
<a class="btn btn-success" href="/">Company List</a>
```

- **urls.py**

```
urlpatterns = [
    path('admin/', admin.site.urls),
    path('', views.CompanyListView.as_view(),name='list'),
    path('<int:pk>/', views.CompanyDetailView.as_view(),name='detail'),
    path('create/', views.CompanyCreateView.as_view()),
    path('update/<int:pk>/', views.CompanyUpdateView.as_view()),
    path('delete/<int:pk>/', views.CompanyDeleteView.as_view()),
```