URL: Uniform Resource Locator

You know what a URL is. but how to make a URL in django? let's learn that along with views!

Views

View is a logic that is excecuted when each URL is called. A set of functions and classes!

To create a view, make an app first (and don't forget to add it in `settings.py`) and then navigate to `views.py` file. (*Nerd out* about the import line). Add this line to the file:

```
from django.http import HttpResponse

def index(request): # or any name you want
    return HttpResponse("Hello, World!")
```

`request` parameter is what the client side sends to the URL `/` which django will recieve and feed into `index()` function.

Now it's time to introduce the url to the app and therefore the django himslef! make a `urls.py` file in the app directory and add this code inside it.

```
from django.urls import path
from . import views # the views file in the same app directory.

urlpatterns = [
    path('sunday', views.index) # the name of the function you made in
views.
]
```

Unfortunately the work isn't done yet, since we used an app (and not the main app) to make a view and a url, we need to add this url to the main app `urls.py` too! Navigate to main app directory and open `urls.py`. update `urlpatterns` to include the newly made url.

```
from django.urls import path, include # include helps add all urls
from an external app to the main app with a single line of code.
from django.contrib import admin

urlpatterns = [
    path('admin/', admin.site.urls),
    path('url_test/', include('url_test.urls'))
]
```

In the line `path('url_test', include('url_test.urls'))`, this first `url_test/` maked a new url like: `localhost:8000/url_test/`. And the second one referes to what you called your external app, they CAN be diffenet indeed!

You can also add a path like this: `path('', include('url_test.urls'))` which directly bonds root url to external app urls.

It is pretty obvious that you need to add a root URL for the main domain. to do that, you must make a `views.py` file in the main app directory and make the desired function for the main page! and then update main app urls to this:

```
from . import views

urlpatterns = [
    path('', views.index),
    path('admin/', admin.site.urls),
    path('url_test/', include('url_test.urls')),
]
```

Conclusion

Basically, the URL system in django is more like a tree. The root of the tree lies in the main app directory `urls.py`. Main branches of this tree would be each external app. The leaves so to speak would be the Views!