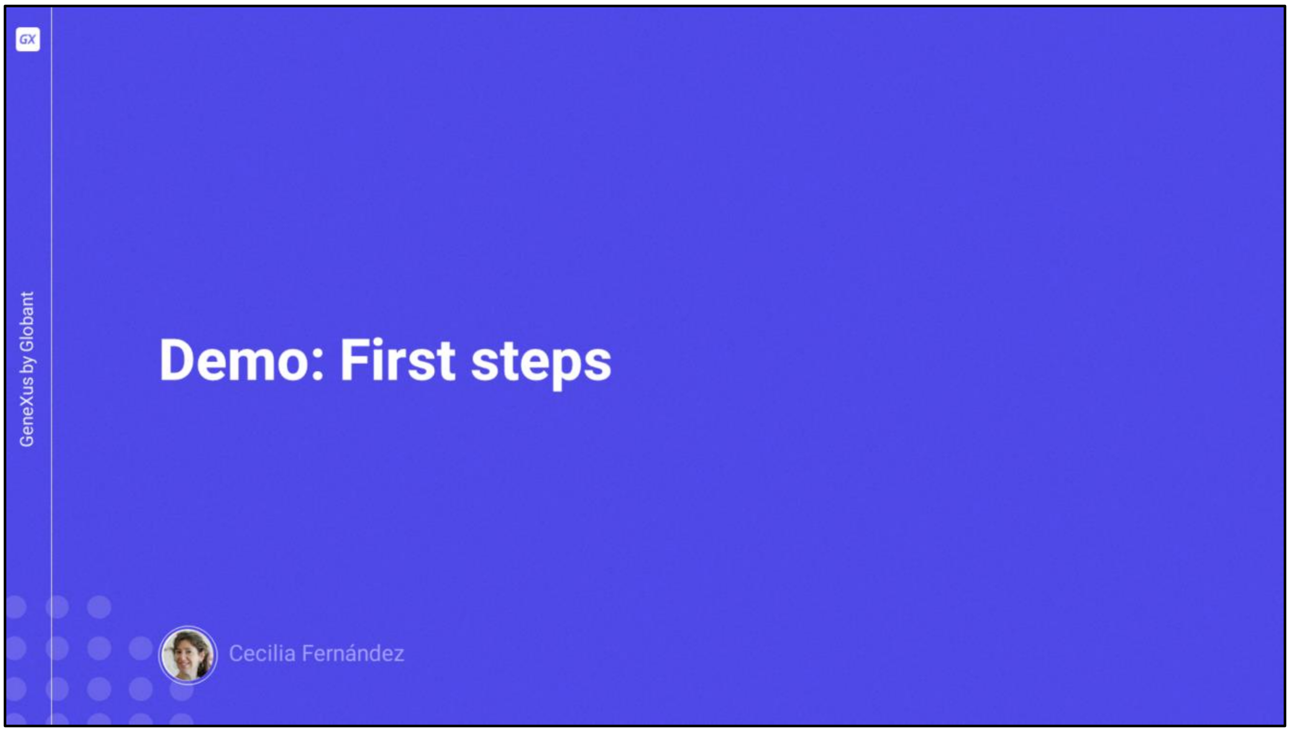
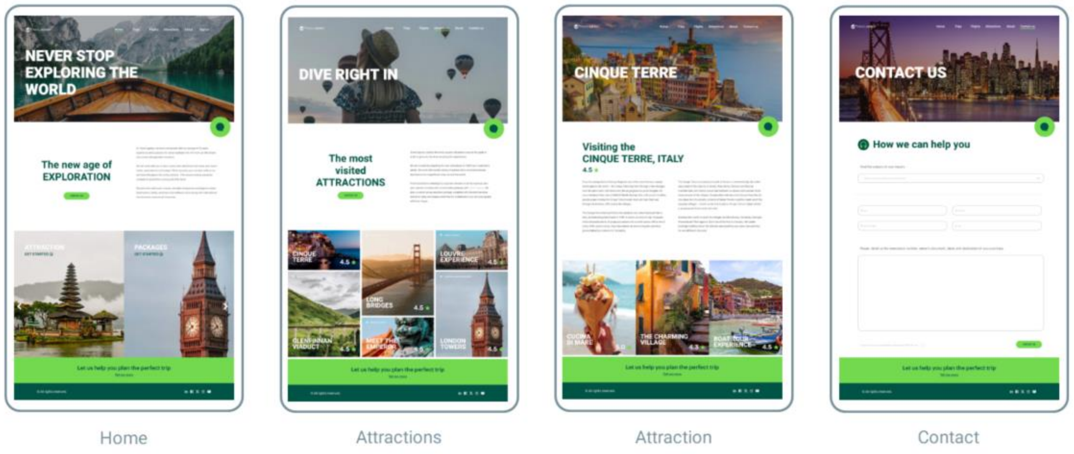


GeneXus by Globant

Demo: First steps

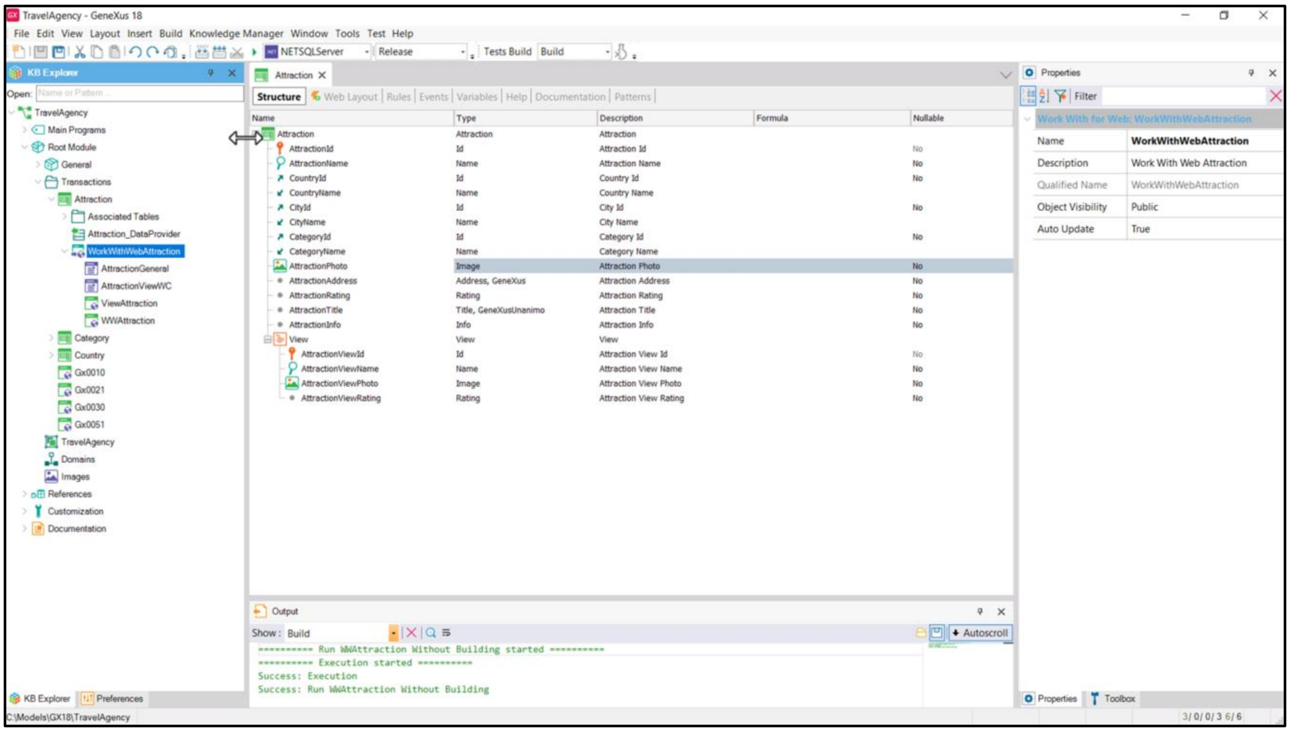
Cecilia Fernández

Hi, how are you?


NEVER STOP EXPLORING THE WORLD
The new age of EXPLORATION
DIVE RIGHT IN
The most visited ATTRACTIONS
CINQUE TERRE
Visiting the CINQUE TERRE, ITALY
CONTACT US
How we can help you
Let us help you plan the perfect trip
Home
Attractions
Attraction
Contact

In this class, we are going to start working on the KB in GeneXus to be able to obtain, a few classes later, the web application that implements these 4 screens that we were talking about, for desktop size.
After that, we will see how to make the application vary according to the screen size, so that it can be run and displayed perfectly on phone or tablet size devices, always for the web application. And then, later on, near the end of the course we will see how to make the application itself run natively on those devices.

Okay, so let's start by going to GeneXus....

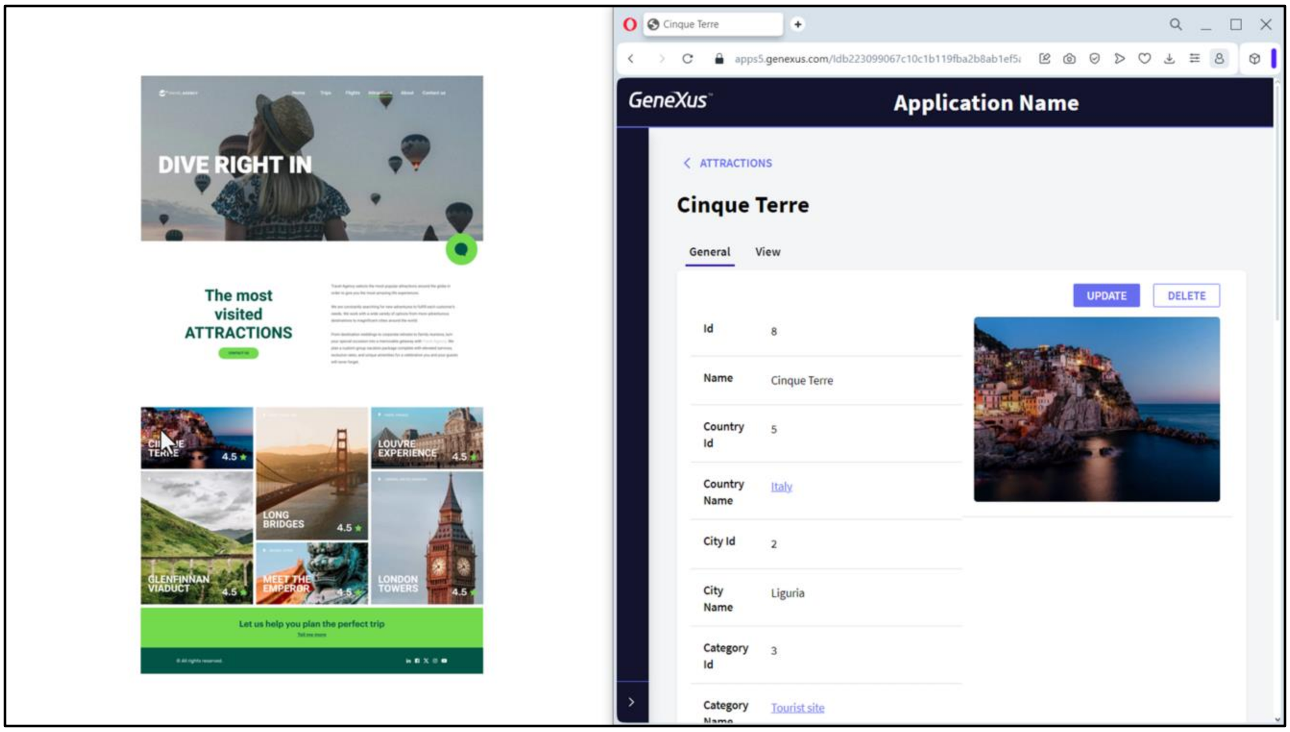


Name	Type	Description	Formula	Nullable
Attraction	Attraction	Attraction		
AttractionId	Id	Attraction Id		No
AttractionName	Name	Attraction Name		No
CountryId	Id	Country Id		No
CountryName	Name	Country Name		
CityId	Id	City Id		No
CityName	Name	City Name		
CategoryId	Id	Category Id		No
CategoryName	Name	Category Name		
AttractionPhoto	Image	Attraction Photo		No
AttractionAddress	Address, GeneXus	Attraction Address		No
AttractionRating	Rating	Attraction Rating		No
AttractionTitle	Title, GeneXusUnanimo	Attraction Title		No
AttractionInfo	Info	Attraction Info		No
View	View	View		
AttractionViewId	Id	Attraction View Id		No
AttractionViewName	Name	Attraction View Name		No
AttractionViewPhoto	Image	Attraction View Photo		No
AttractionViewRating	Rating	Attraction View Rating		No

Name	WorkWithWebAttraction
Description	Work With Web Attraction
Qualified Name	WorkWithWebAttraction
Object Visibility	Public
Auto Update	True

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
Success: Execution
Success: Run WWAttraction Without Building
```

...and note that I created a KB named TravelAgency, where inside a Transactions folder I created the three transactions that in a simplified way will register the data in the Backoffice. I populated each one with data from a data provider and applied the Work With Web pattern.

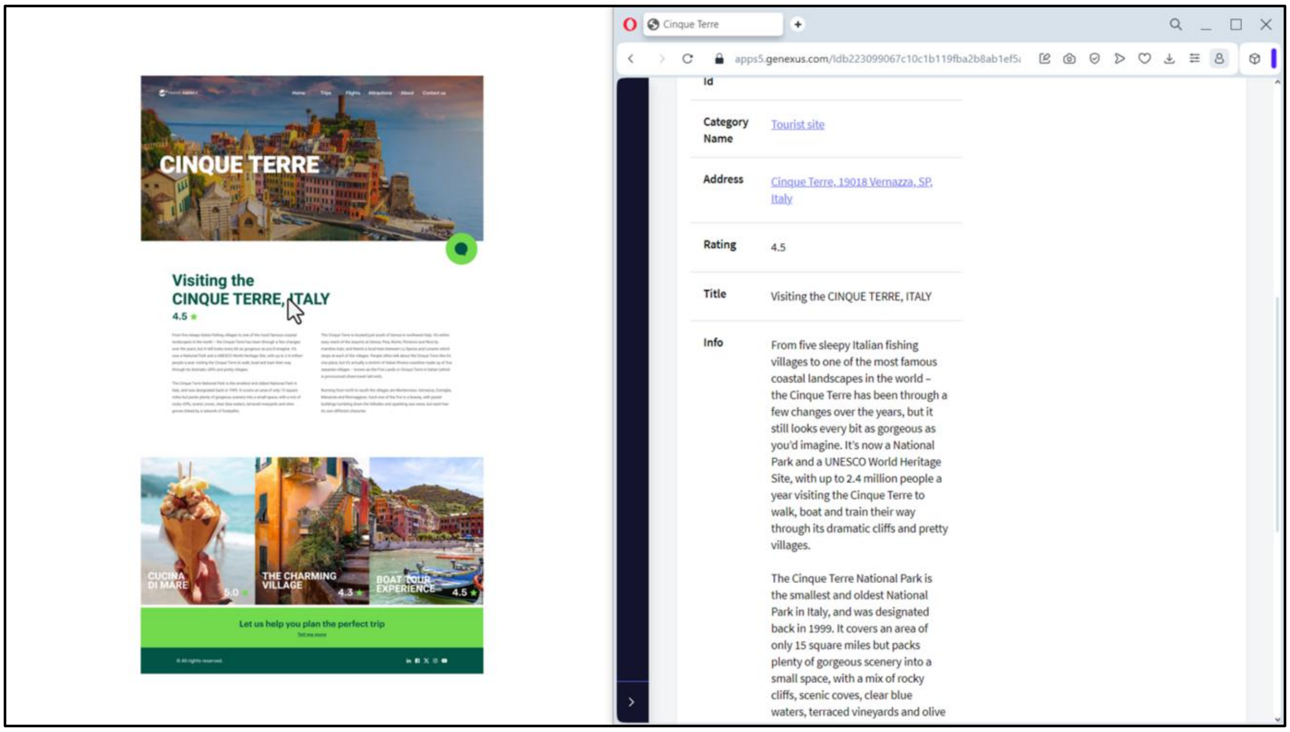


Cinque Terre

Id	8
Name	Cinque Terre
Country Id	5
Country Name	Italy
City Id	2
City Name	Liguria
Category Id	3
Category Name	Tourist site

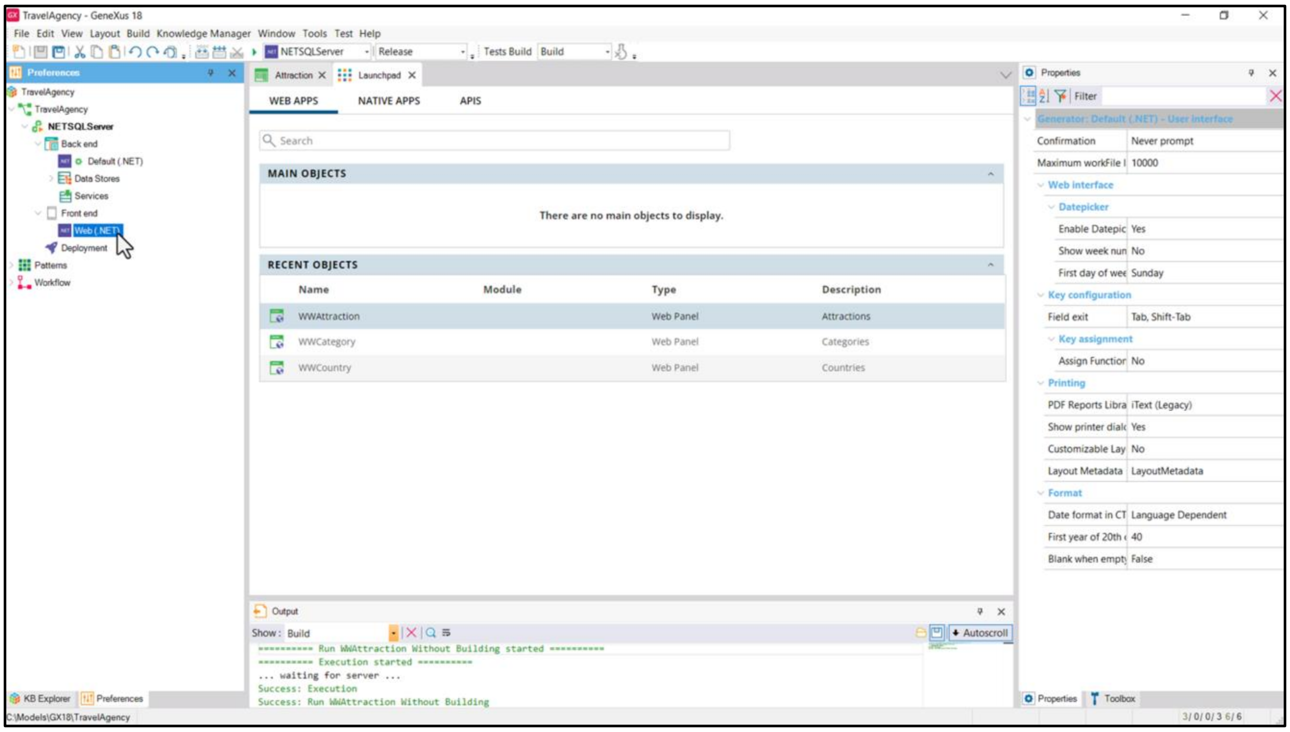
So, if I run... we see the Work With of the tourist attractions.

And if I choose this one, we see here the photo that will be used for the Customer-facing application (the one we are trying to implement), the name of the attraction, the rating...


CINQUE TERRE
Visiting the CINQUE TERRE, ITALY
4.5
CUCINA DI MARE 5.0
THE CHARMING VILLAGE 4.3
BOAT TOUR EXPERIENCE 4.5
Let us help you plan the perfect trip
Cinque Terre
apps5.genexus.com/Idb223099067c10c1b119fba2b8ab1ef5

Id	
Category Name	Tourist site
Address	Cinque Terre, 19018 Vernazza, SP, Italy
Rating	4.5
Title	Visiting the CINQUE TERRE, ITALY
Info	From five sleepy Italian fishing villages to one of the most famous coastal landscapes in the world – the Cinque Terre has been through a few changes over the years, but it still looks every bit as gorgeous as you'd imagine. It's now a National Park and a UNESCO World Heritage Site, with up to 2.4 million people a year visiting the Cinque Terre to walk, boat and train their way through its dramatic cliffs and pretty villages. The Cinque Terre National Park is the smallest and oldest National Park in Italy, and was designated back in 1999. It covers an area of only 15 square miles but packs plenty of gorgeous scenery into a small space, with a mix of rocky cliffs, scenic coves, clear blue waters, terraced vineyards and olive

...the title that will be shown on the attraction's page, the information that will be listed on that page, and if we go to the View tab, here we see this information related to the tourist attraction that will be shown in a carousel, on this page, that can then be scrolled.



MAIN OBJECTS

There are no main objects to display.

RECENT OBJECTS

Name	Module	Type	Description
WWAttraction		Web Panel	Attractions
WWCategory		Web Panel	Categories
WWCountry		Web Panel	Countries

Generator: Default (.NET) - User Interface

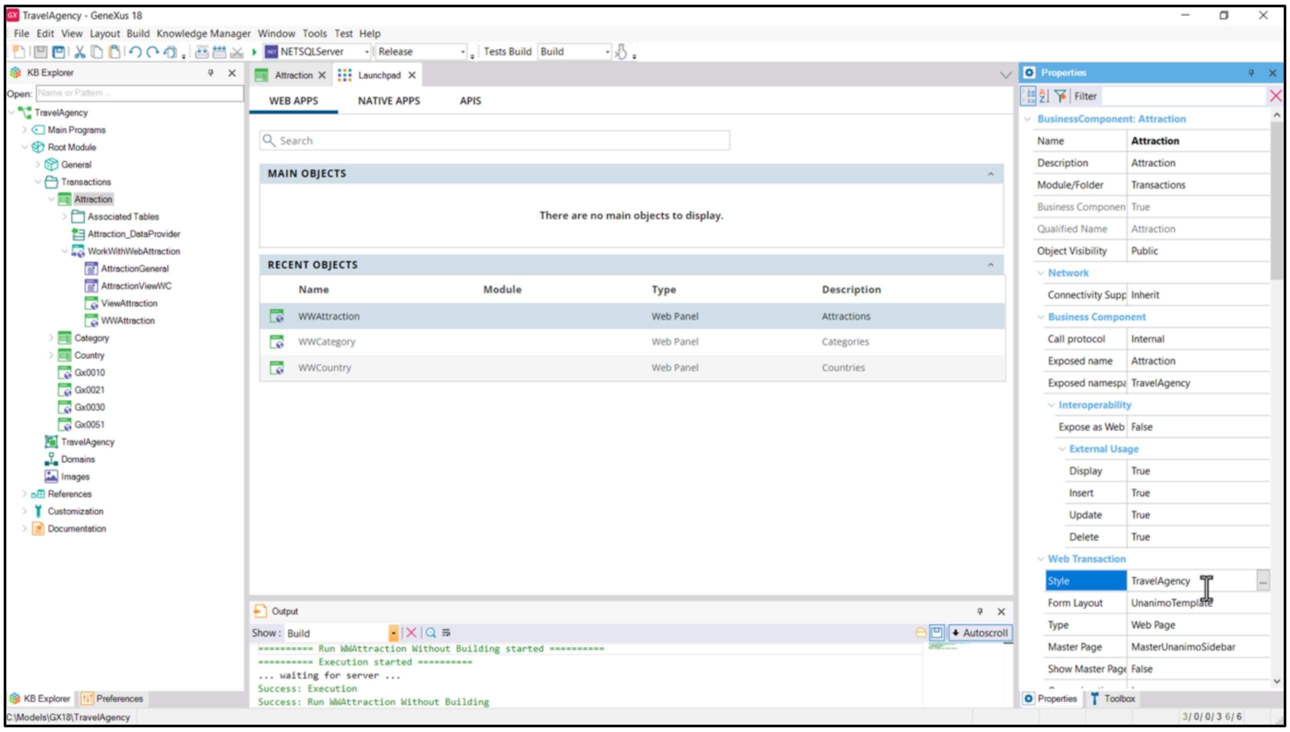
Confirmation	Never prompt
Maximum workFile l	10000
Web interface	
Datepicker	
Enable Datepic	Yes
Show week nun	No
First day of wee	Sunday
Key configuration	
Field exit	Tab, Shift-Tab
Key assignment	
Assign Functior	No
Printing	
PDF Reports Libra	iText (Legacy)
Show printer dialc	Yes
Customizable Lay	No
Layout Metadata	LayoutMetadata
Format	
Date format in CT	Language Dependent
First year of 20th	40
Blank when empty	False

Show: Build

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

C:\Models\GX18\TravelAgency

What we see running here is the Backoffice that we know that the Web (.NET) generator uses by default for its Frontend.



MAIN OBJECTS

There are no main objects to display.

RECENT OBJECTS

Name	Module	Type	Description
WWAttraction		Web Panel	Attractions
WWCategory		Web Panel	Categories
WWCountry		Web Panel	Countries

Properties

BusinessComponent: Attraction

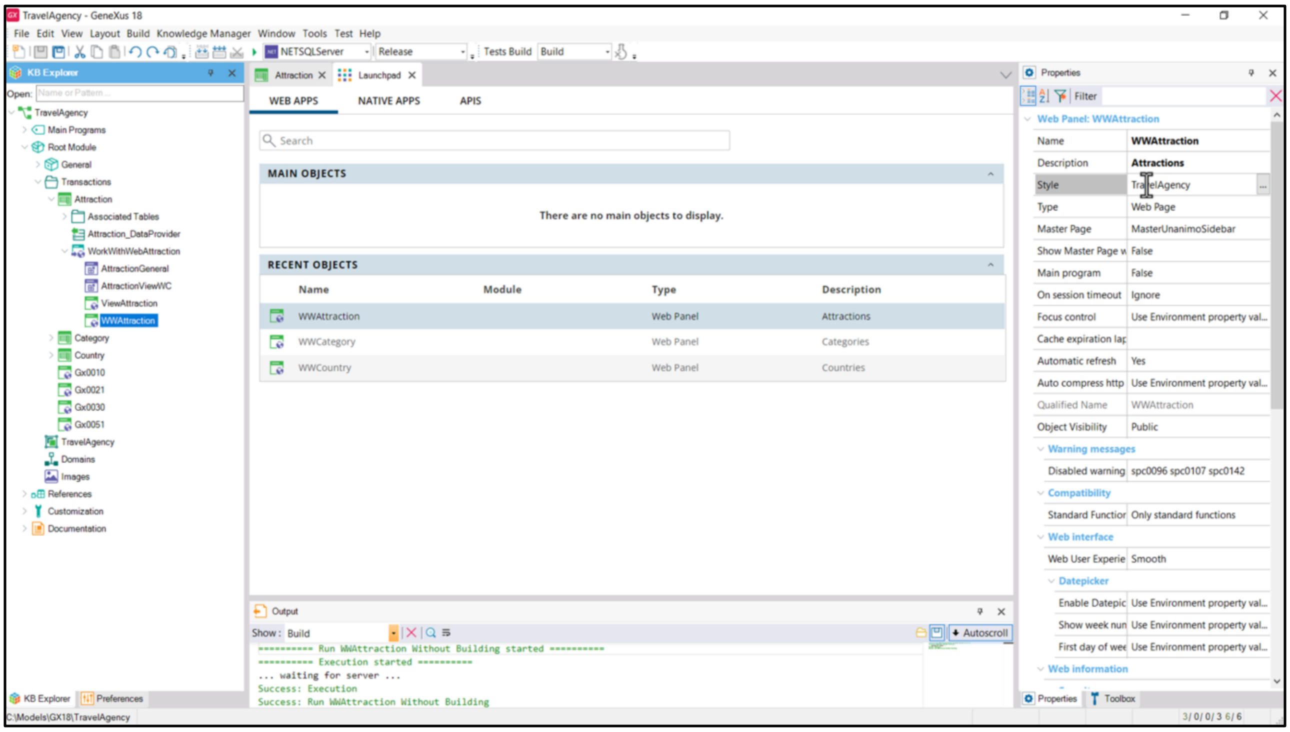
Name	Attraction
Description	Attraction
Module/Folder	Transactions
Business Componen	True
Qualified Name	Attraction
Object Visibility	Public
Network	
Connectivity Supp	Inherit
Business Component	
Call protocol	Internal
Exposed name	Attraction
Exposed namespa	TravelAgency
Interoperability	
Expose as Web	False
External Usage	
Display	True
Insert	True
Update	True
Delete	True
Web Transaction	
Style	TravelAgency
Form Layout	UnanimoTemplate
Type	Web Page
Master Page	MasterUnanimoSidebar
Show Master Page	False

Output

Show: Build

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

And what is the Design System object that determines the style of the User Interface of this Backoffice? If we look at the properties of the Attraction transaction, we see that the one with the name Style indicates the object with the same name as the KB.



Web Panel: WWAttraction

Name	WWAttraction
Description	Attractions
Style	TravelAgency
Type	Web Page
Master Page	MasterUnanimoSidebar
Show Master Page w	False
Main program	False
On session timeout	Ignore
Focus control	Use Environment property val...
Cache expiration lap	
Automatic refresh	Yes
Auto compress http	Use Environment property val...
Qualified Name	WWAttraction
Object Visibility	Public
Warning messages	
Disabled warning	spc0096 spc0107 spc0142
Compatibility	
Standard Functior	Only standard functions
Web interface	
Web User Experie	Smooth
Datepicker	
Enable Datepic	Use Environment property val...
Show week nun	Use Environment property val...
First day of wee	Use Environment property val...
Web information	

MAIN OBJECTS

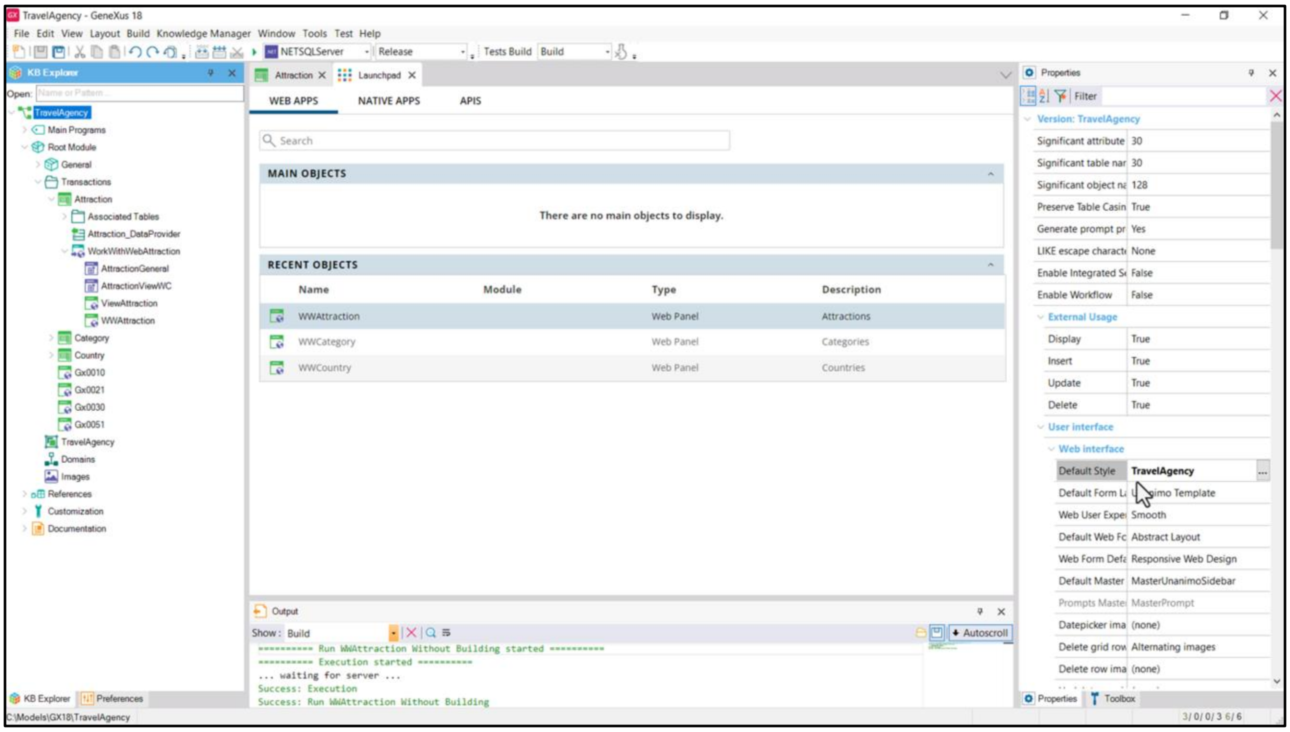
There are no main objects to display.

RECENT OBJECTS

Name	Module	Type	Description
WWAttraction		Web Panel	Attractions
WWCategory		Web Panel	Categories
WWCountry		Web Panel	Countries

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

If we go to the properties of the WorkWithAttraction Web Panel, for Style we see the same Travel Agency object. The same goes for the View, as well as for the other transactions and Web Panels and objects with an interface that are created for the Backoffice.



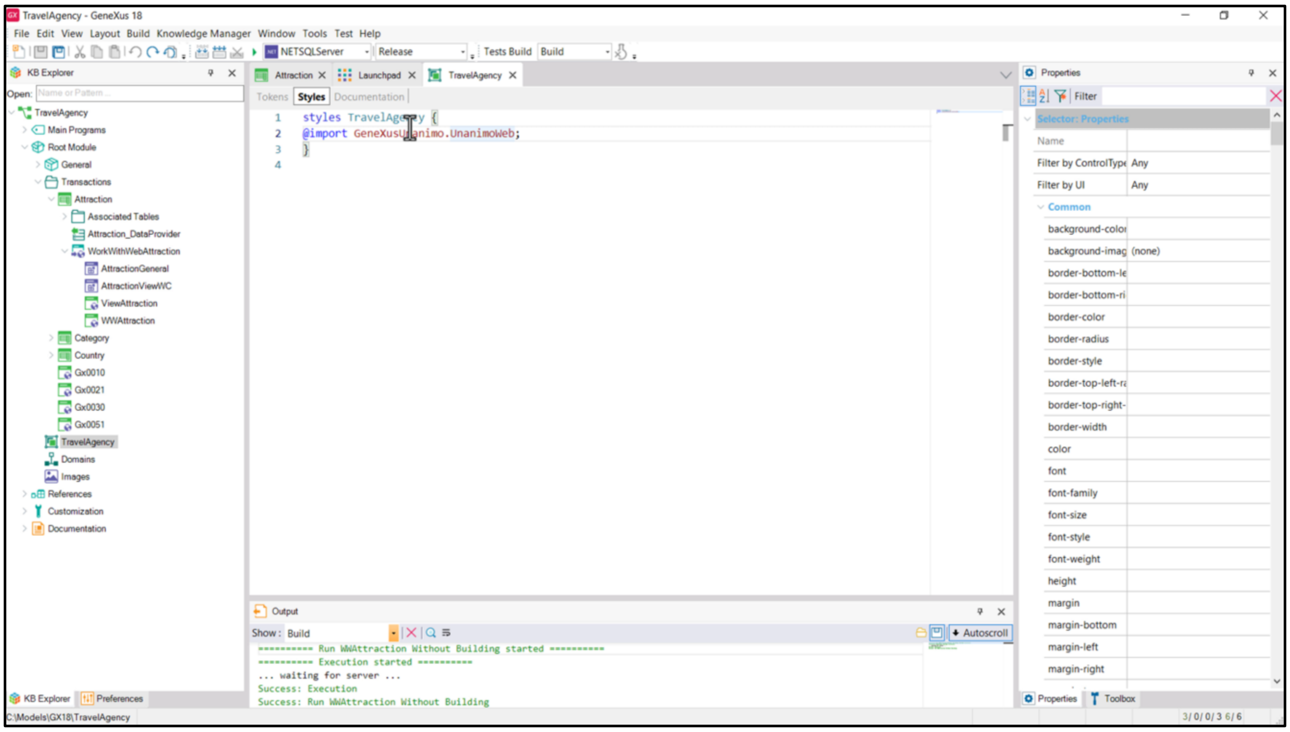
There are no main objects to display.

Name	Module	Type	Description
WWAttraction		Web Panel	Attractions
WWCategory		Web Panel	Categories
WWCountry		Web Panel	Countries

Version: TravelAgency	
Significant attribute	30
Significant table nar	30
Significant object na	128
Preserve Table Casin	True
Generate prompt pr	Yes
LIKE escape characte	None
Enable Integrated S	False
Enable Workflow	False
External Usage	
Display	True
Insert	True
Update	True
Delete	True
User interface	
Web interface	
Default Style	TravelAgency
Default Form La	U[illegible]imo Template
Web User Exper	Smooth
Default Web Fc	Abstract Layout
Web Form Defa	Responsive Web Design
Default Master	MasterUnanimoSidebar
Prompts Maste	MasterPrompt
Datepicker ima	(none)
Delete grid row	Alternating images
Delete row ima	(none)

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

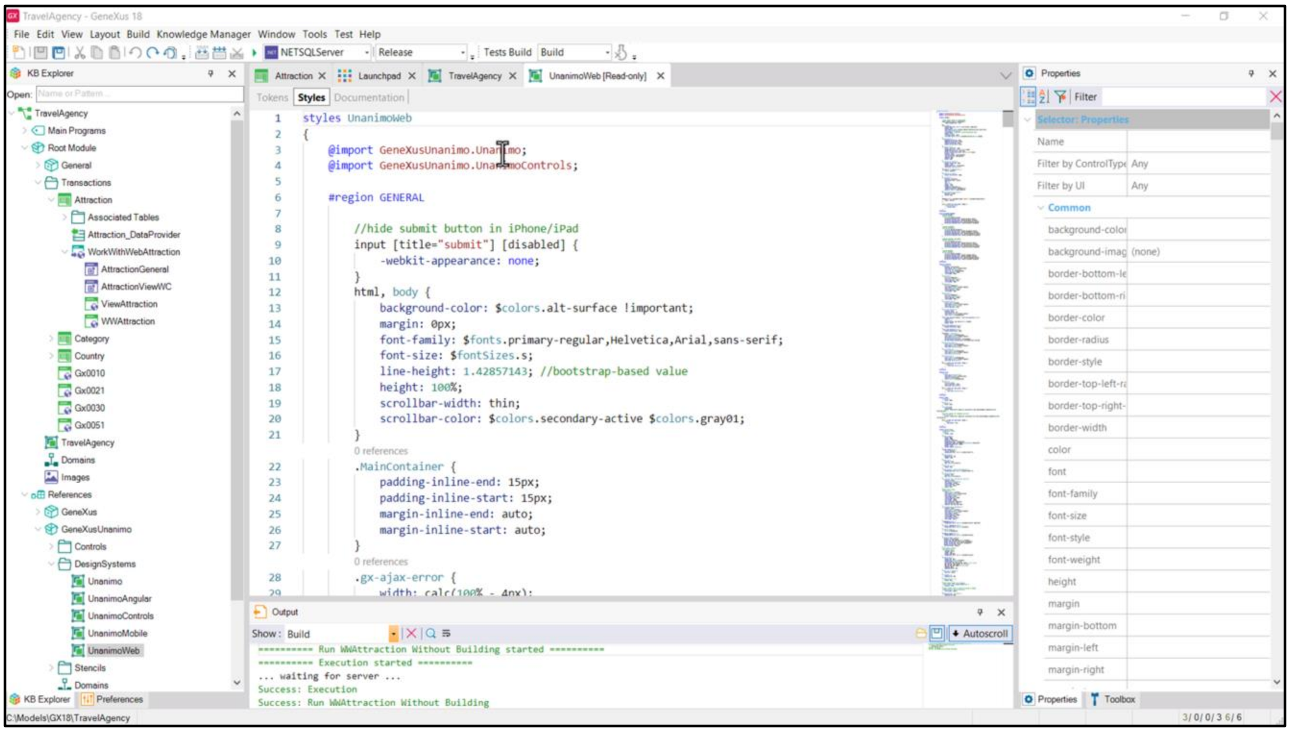
We see this in the Style property of the KB version.



```
styles TravelAgency {
@import GeneXusUnanimo.UnanimoWeb;
}
```

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

Remember that this DSO object is the only one that is created by default when creating any KB, and that it takes the same name.
If we open it, we see that the Tokens tab is empty, but in the Styles tab it has this rule, which indicates that all the tokens and styles of this other Design System Object, which is in the GeneXusUnanimo module, will be imported.

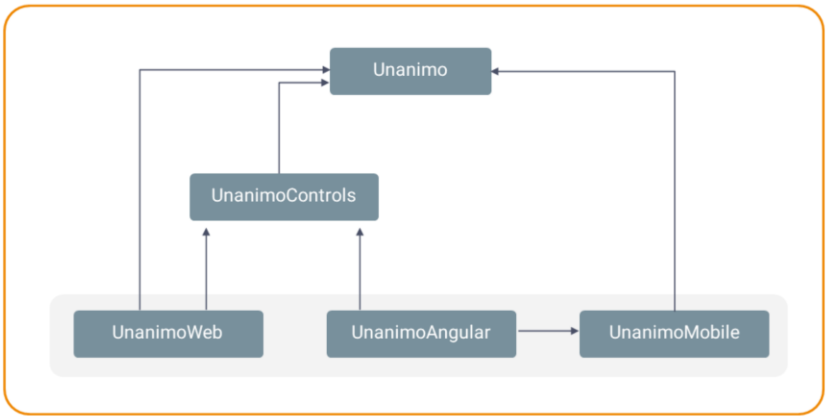


```
styles UnanimoWeb
{
    @import GeneXusUnanimo.Unanimo;
    @import GeneXusUnanimo.UnanimoControls;

    #region GENERAL

        //hide submit button in iPhone/iPad
        input [title="submit"] [disabled] {
            -webkit-appearance: none;
        }
        html, body {
            background-color: $colors.alt-surface !important;
            margin: 0px;
            font-family: $fonts.primary-regular,Helvetica,Arial,sans-serif;
            font-size: $fontSizes.s;
            line-height: 1.42857143; //bootstrap-based value
            height: 100%;
            scrollbar-width: thin;
            scrollbar-color: $colors.secondary-active $colors.gray01;
        }
        0 references
        .MainContainer {
            padding-inline-end: 15px;
            padding-inline-start: 15px;
            margin-inline-end: auto;
            margin-inline-start: auto;
        }
        0 references
        .gx-ajax-error {
            width: calc(100% - 4px);
```

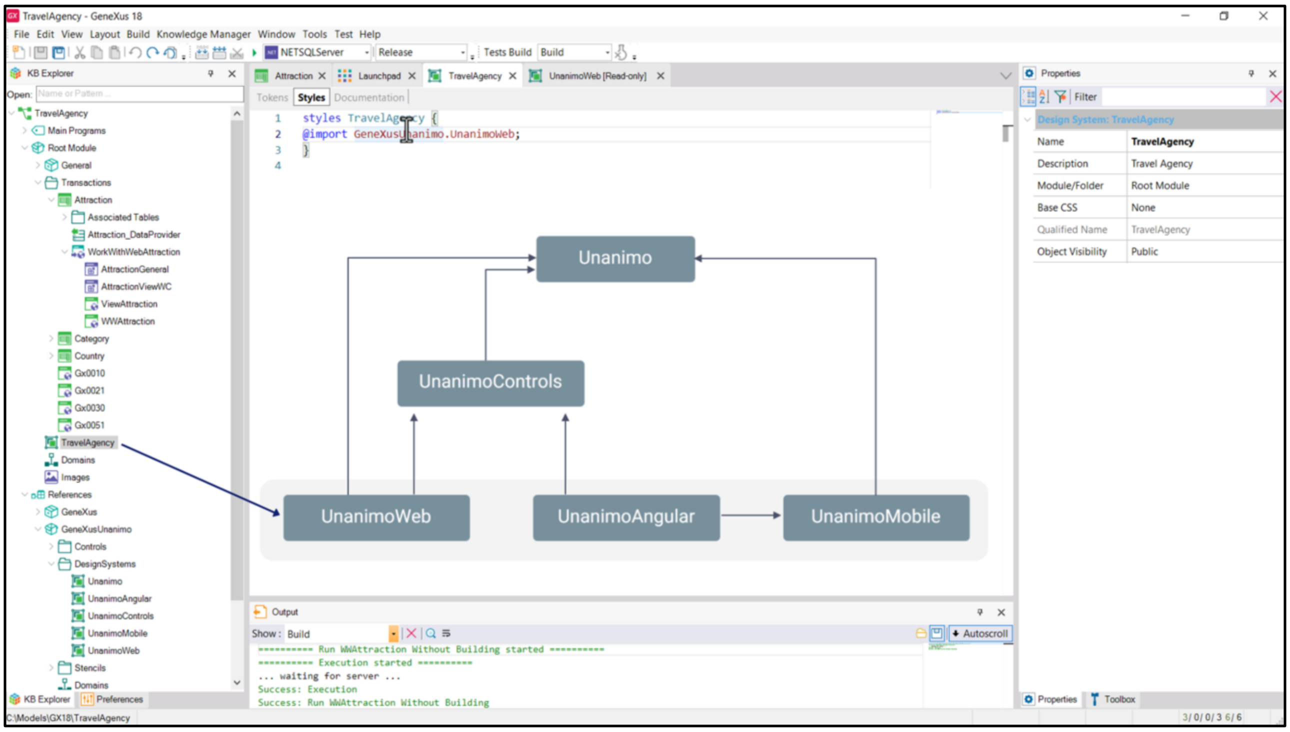
```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

And where is this GeneXusUnanimo module? It came installed by default in every KB, and it can be found below the References node.
We open it and see that it is read-only, but, in addition to its specific token and style definitions, it is importing two other DSOs, these ones, which are in the same module.

So it builds on top of these other two.



On the other hand, if we open these ones that we see here, what we will get is this tree, where UnanimoMobile only imports Unanimo, and UnanimoAngular imports the mobile one and also UnanimoControls.

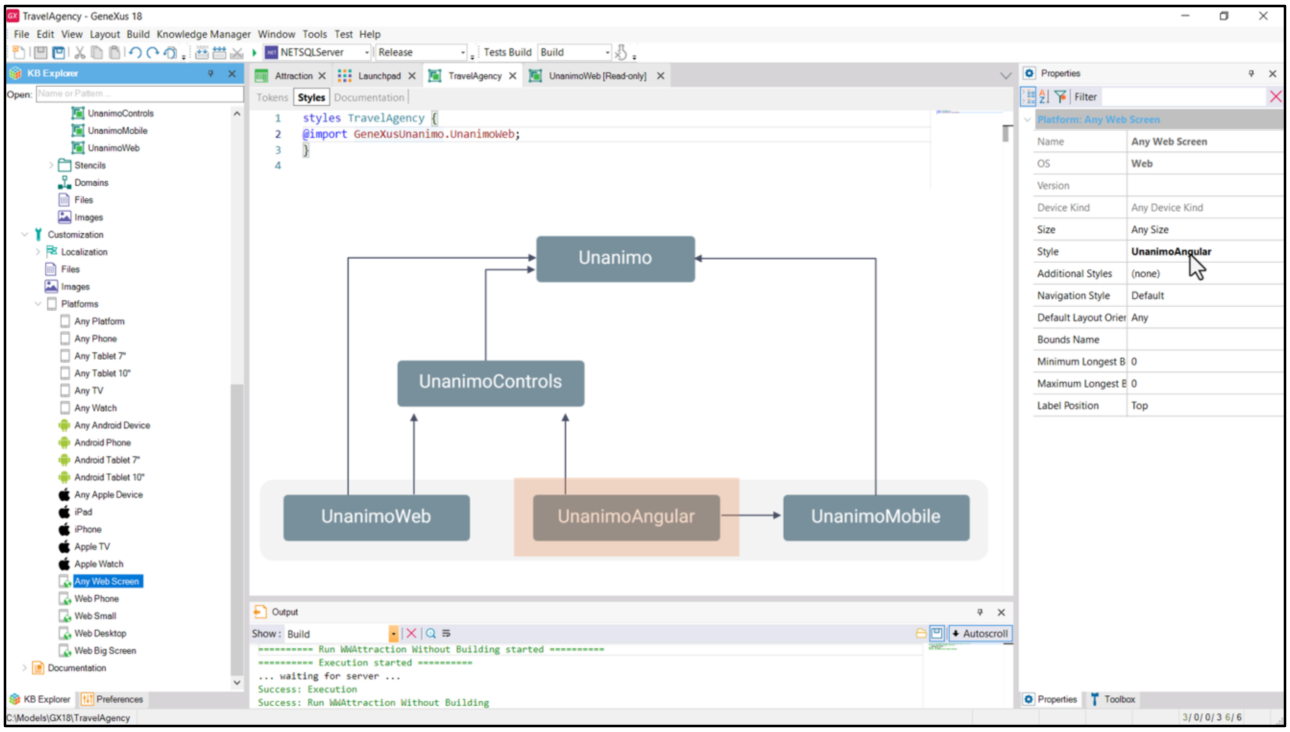


```
styles TravelAgency {
@import GeneXusUnanimo.UnanimoWeb;
}
```

Name	TravelAgency
Description	Travel Agency
Module/Folder	Root Module
Base CSS	None
Qualified Name	TravelAgency
Object Visibility	Public

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

If UnanimoWeb will be the one used by default in the Web Frontend, because, as we saw, it uses a DSO with the same name as the KB that imports it...



```
styles TravelAgency {
@import GeneXusUnanimo.UnanimoWeb;
}
```

Platform: Any Web Screen

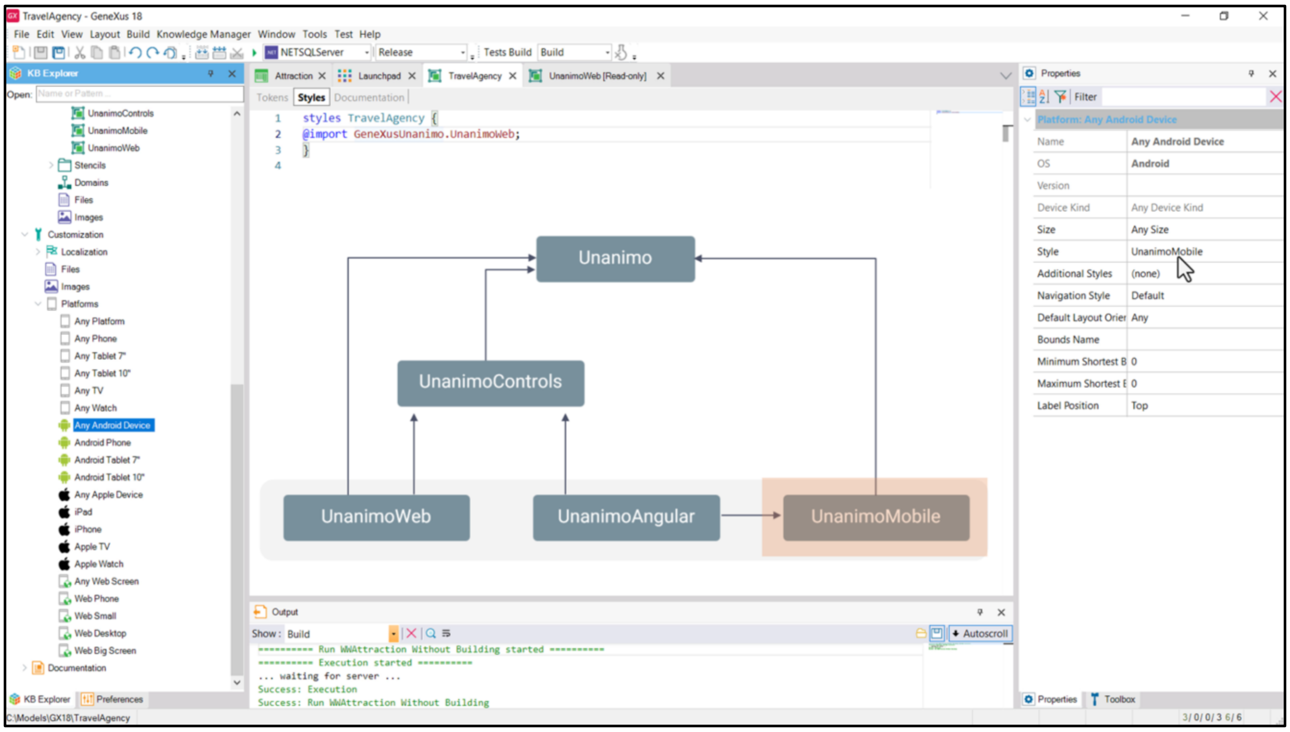
Name	Any Web Screen
OS	Web
Version	
Device Kind	Any Device Kind
Size	Any Size
Style	UnanimoAngular
Additional Styles	(none)
Navigation Style	Default
Default Layout Orier	Any
Bounds Name	
Minimum Longest B	0
Maximum Longest B	0
Label Position	Top

Output

Show: Build

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

... clearly UnanimoAngular will be the default also for the Web Frontend but Angular...



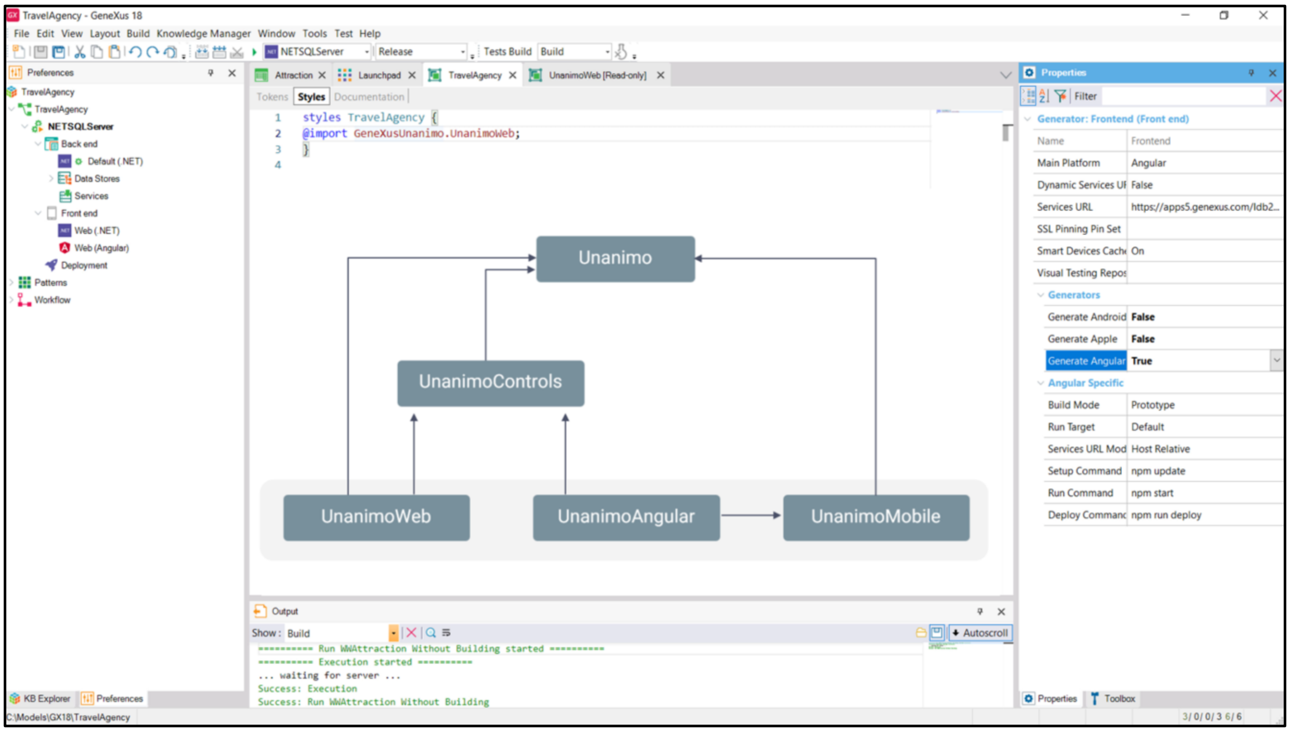
```
styles TravelAgency {
@import GeneXusUnanimo.UnanimoWeb;
}
```

Platform: Any Android Device

Name	Any Android Device
OS	Android
Version	
Device Kind	Any Device Kind
Size	Any Size
Style	UnanimoMobile
Additional Styles	(none)
Navigation Style	Default
Default Layout Orier	Any
Bounds Name	
Minimum Shortest B	0
Maximum Shortest E	0
Label Position	Top

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

...and UnanimoMobile will be the default for Mobile Frontend (for all platforms, both Android and Apple).



```
styles TravelAgency {
@import GeneXusUnanimo.UnanimoWeb;
}
```

Generator: Frontend (Front end)

Name	Frontend
Main Platform	Angular
Dynamic Services UI	False
Services URL	https://apps5.genexus.com/Idb2...
SSL Pinning Pin Set	
Smart Devices Cach	On
Visual Testing Repos	

Generators

Generate Android	False
Generate Apple	False
Generate Angular	True

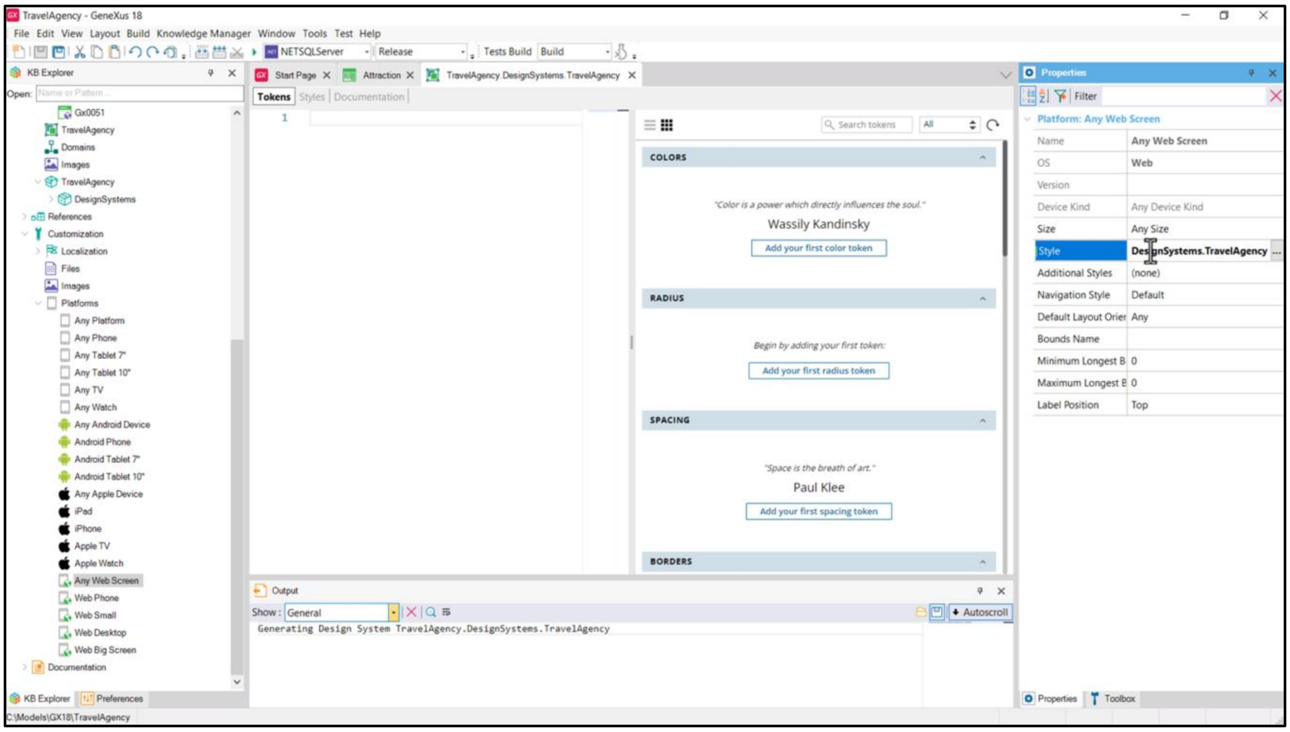
Angular Specific

Build Mode	Prototype
Run Target	Default
Services URL Mod	Host Relative
Setup Command	npm update
Run Command	npm start
Deploy Commanc	npm run deploy

Show : Build

```
========== Run WWAttraction Without Building started ==========
========== Execution started ==========
... waiting for server ...
Success: Execution
Success: Run WWAttraction Without Building
```

As we don't have any Frontend for these platforms yet, we can't see these DSOs in action. We won't want to use them anyway. We will want to build the Customer-facing application that will have another design system, the one designed by Chechu and we have been analyzing, so we will create the DSO for Angular (which is the platform we will focus on most of the course) from scratch. And then, at the end, we will see the native case.



Properties
Platform: Any Web Screen

Name	Any Web Screen
OS	Web
Version	
Device Kind	Any Device Kind
Size	Any Size
Style	DesignSystems.TravelAgency
Additional Styles	(none)
Navigation Style	Default
Default Layout Orier	Any
Bounds Name	
Minimum Longest B	0
Maximum Longest B	0
Label Position	Top

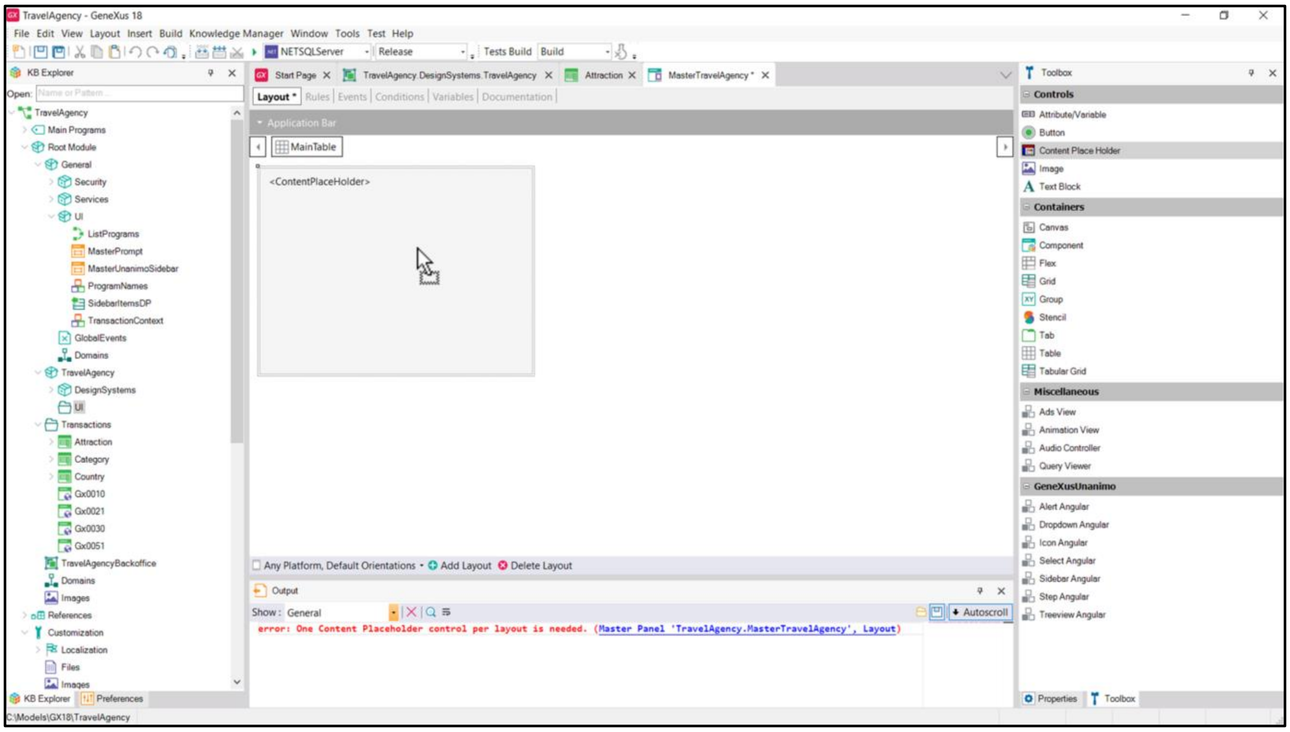
```
Generating Design System TravelAgency.DesignSystems.TravelAgency
```

To clearly separate the objects that will be specific to our Customer-facing application from all the default objects in the KB, and those of the Backoffice, we will create a module that for now I will call TravelAgency.

And inside it I will create another module, DesignSystems, to place the DS objects that we will use. Later on we will see why there will be several and not just one. Now we can create the one that will determine the style of the Angular application that we will develop initially for Desktop size. Let's call it TravelAgency and define that it will be used for that platform.

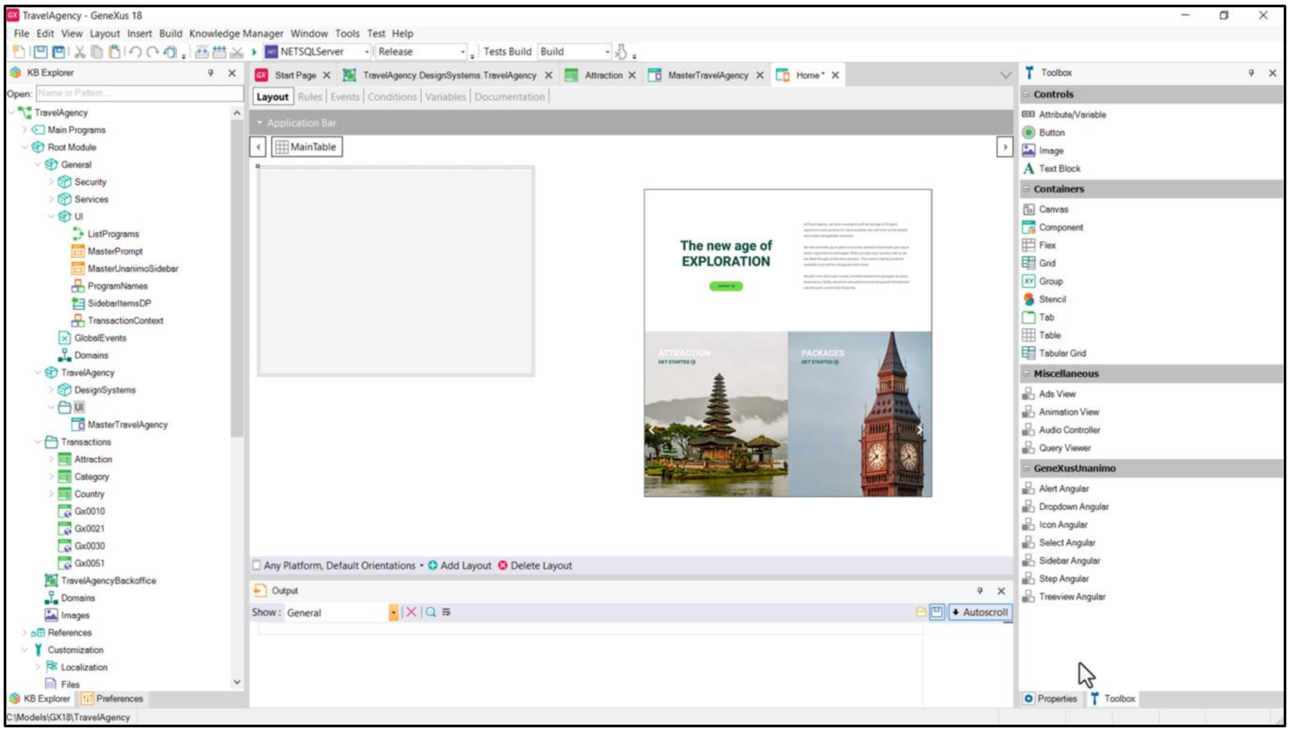
We now have two TravelAgency DSOs, but we choose the one for the DesignSystems module we've just created. All of the more specific web Angular platforms will inherit that DSO.

We were able to give this other DSO the same name because we placed it inside a module. But let's rename this one so we don't get confused.

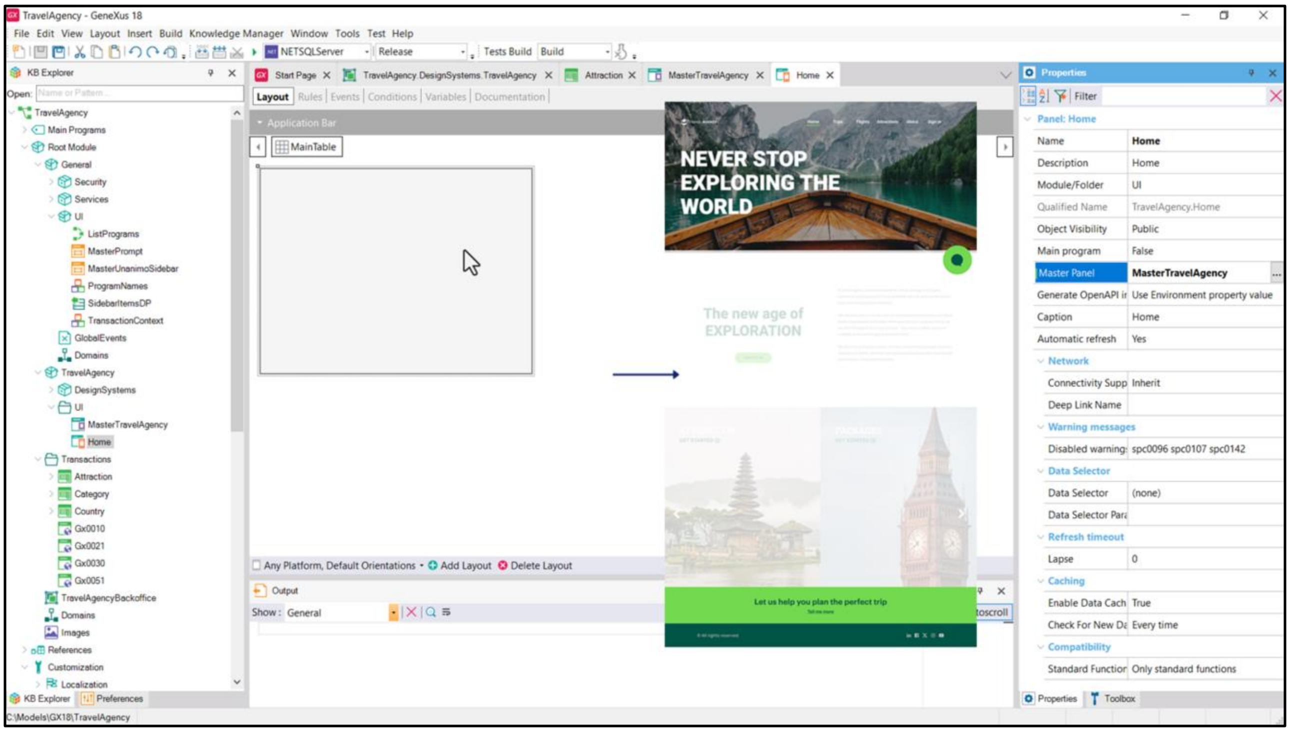


```
error: One Content Placeholder control per layout is needed. (Master Panel 'TravelAgency.MasterTravelAgency', Layout)
```

Now we are going to create a folder inside the module to organize there all the objects with a user interface.
First of all, let's create the Master Panel and name it this way. If I try to save it empty, I will get this error. It is mandatory to place the ContentPlaceholder control, which is where the panels that have this as their Master Panel will be loaded. Now we will be allowed to save the object.


TravelAgency - GeneXus 18
File Edit View Layout Insert Build Knowledge Manager Window Tools Test Help
KB Explorer
Start Page
TravelAgency.DesignSystems.TravelAgency
Attraction
MasterTravelAgency
Home*
Layout Rules Events Conditions Variables Documentation
Application Bar
MainTable
The new age of EXPLORATION
ATTRACTION
PACKAGES
Any Platform, Default Orientations Add Layout Delete Layout
Output
Toolbox
Controls
Containers
Miscellaneous
GeneXusUnanimo
C:\Models\GX18\TravelAgency

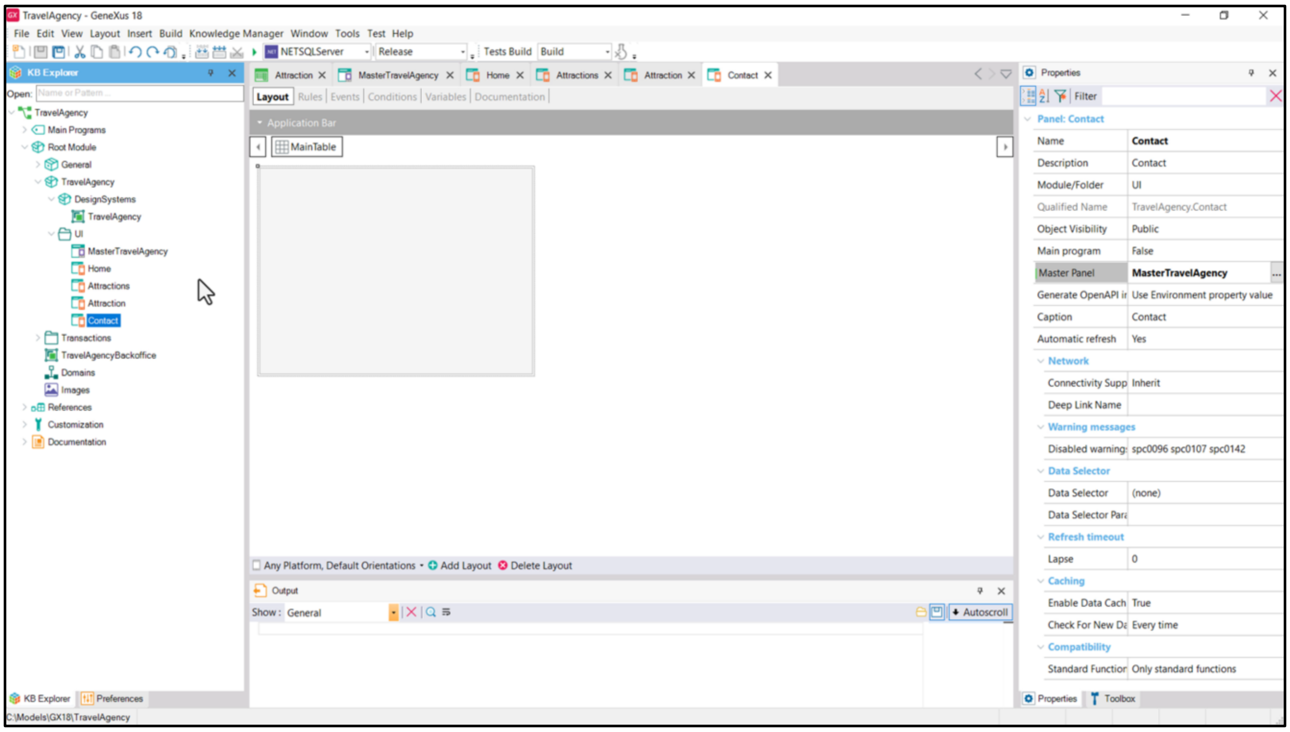
We are going to create the first panel, Home, which will implement this part of the screen that we saw in Figma.


TravelAgency - GeneXus 18
KB Explorer
Start Page
TravelAgency.DesignSystems.TravelAgency
Attraction
MasterTravelAgency
Home
Layout
Rules
Events
Conditions
Variables
Documentation
Application Bar
MainTable
NEVER STOP EXPLORING THE WORLD
The new age of EXPLORATION
Let us help you plan the perfect trip
Any Platform, Default Orientations
Add Layout
Delete Layout
Output
Properties
Toolbox

Panel: Home

Name	Home
Description	Home
Module/Folder	UI
Qualified Name	TravelAgency.Home
Object Visibility	Public
Main program	False
Master Panel	MasterTravelAgency
Generate OpenAPI i	Use Environment property value
Caption	Home
Automatic refresh	Yes
Network	
Connectivity Supp	Inherit
Deep Link Name	
Warning messages	
Disabled warning:	spc0096 spc0107 spc0142
Data Selector	
Data Selector	(none)
Data Selector Para	
Refresh timeout	
Lapse	0
Caching	
Enable Data Cach	True
Check For New Da	Every time
Compatibility	
Standard Functior	Only standard functions

And we have to set it to load inside the Master Panel that we've just created. That is to say, it will be loaded in here...

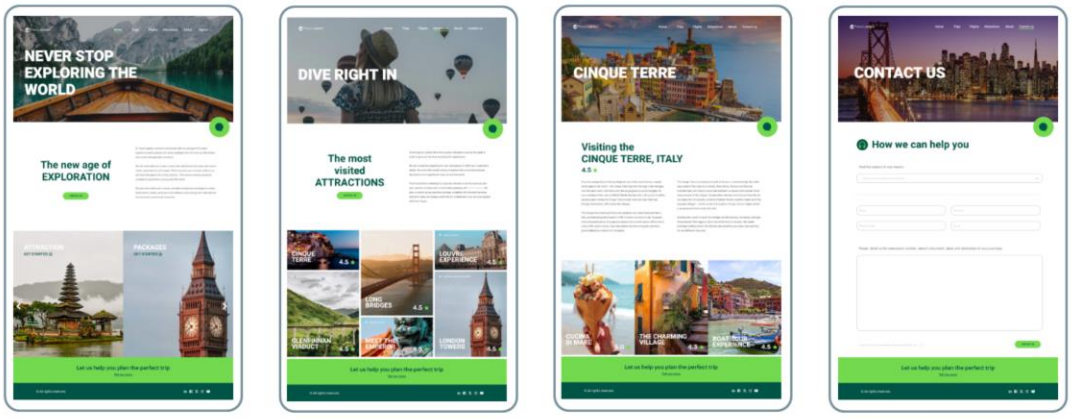


Panel: Contact

Name	Contact
Description	Contact
Module/Folder	UI
Qualified Name	TravelAgency.Contact
Object Visibility	Public
Main program	False
Master Panel	MasterTravelAgency
Generate OpenAPI ir	Use Environment property value
Caption	Contact
Automatic refresh	Yes
Network	
Connectivity Supp	Inherit
Deep Link Name	
Warning messages	
Disabled warning:	spc0096 spc0107 spc0142
Data Selector	
Data Selector	(none)
Data Selector Para	
Refresh timeout	
Lapse	0
Caching	
Enable Data Cach	True
Check For New Da	Every time
Compatibility	
Standard Functior	Only standard functions

And we have to set it to load inside the Master Panel that we've just created. That is to say, it will be loaded in here...

Now, in the same way we will create the other three panels, which are empty for the moment. And with the same Master Panel.


NEVER STOP EXPLORING THE WORLD
The new age of EXPLORATION
DIVE RIGHT IN
The most visited ATTRACTIONS
CINQUE TERRE
Visiting the CINQUE TERRE, ITALY
CONTACT US
How we can help you
Let us help you plan the perfect trip

Home

Attractions

Attraction

Contact

Well, now we have the KB initialized to start working on each object and implement each layout portion. See you in the next class!

GeneXus by Globant

training.genexus.com