

ANDROID DEVELOPMENT – S4

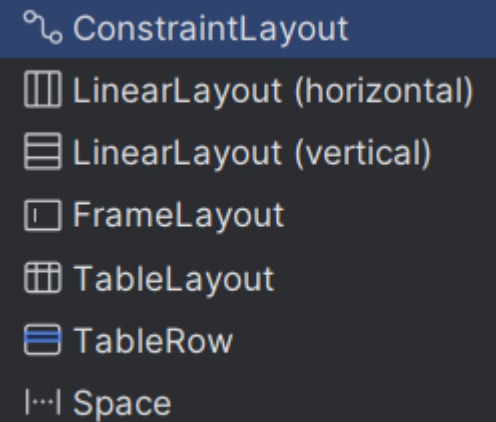
LISBON, FEBRUARY 2025

ERASMUS+



LAYOUTS TYPES

- **LinearLayout:** is a view group that aligns all children in a single direction, vertically or horizontally.
- **RelativeLayout:** Allows positioning of its children relative to each other or to the parent.
- **ConstraintLayout:** Provides a flexible way to create complex layouts with a flat view hierarchy.
- **FrameLayout:** Designed to block out an area on the screen to display a single item.
- **GridLayout:** Places its children in a rectangular grid.
- **TableLayout:** Organizes its children into rows and columns.



-  ConstraintLayout
-  LinearLayout (horizontal)
-  LinearLayout (vertical)
-  FrameLayout
-  TableLayout
-  TableRow
-  Space

FRAGMENTS

- **Fragments** in Android are reusable portions of your app's UI. They allow you to create modular and flexible user interfaces that can be used across different activities and screen sizes.

PALLETE

Palette

Common

Text

Buttons

Widgets

Layouts

Containers

Helpers

Google

Ab TextView

Ab Plain Text

Ab Password

Ab Password (Numeric)

Ab E-mail

Ab Phone

Ab Postal Address

Ab Multiline Text

Ab Time

Ab Date

Ab Number

Ab Number (Signed)

Ab Number (Decimal)

A✓ AutoCompleteTextView

≡ MultiAutoCompleteTextView

A✓ CheckedTextView

Ab TextInputLayout

 Button

 ImageButton

 ChipGroup

 Chip

 ✓ CheckBox

 ● RadioGroup

 ● RadioButton

  ToggleButton

 Switch

 + FloatingActionButton

 Spinner

 ≡ RecyclerView

  ScrollView

  HorizontalScrollView

  NestedScrollView



  ViewPager2

  CardView

  AppBarLayout

  BottomAppBar

  NavigationView

  BottomNavigationView

  Toolbar

  MaterialToolbar

  TabLayout

  TabItem

  ViewStub

  ViewAnimator

  ViewSwitcher

  <include>

  FragmentContainerView

  NavHostFragment

  <view>

  <requestFocus>

PALETE

- [] Group
- |—| Barrier (Horizontal)
- ┤─┤ Barrier (Vertical)
- ≡≡≡ Flow
- |...| Guideline (Horizontal)
- ┤...┤ Guideline (Vertical)
- ◇ Layer
- 🖼 ImageFilterView
- 🖼 ImageFilterButton
- ☒ MockView

- Ad AdView ↓
- 📍 MapView ↓

ANDROID'S UNIT MEASUREMENTS

px	Pixels - Absolute measurement, the smallest visual unit on a screen
dp or dip	Density-independent Pixels - An abstract unit based on the physical density of the screen (160 dpi) $px = dp * (dpi / 160)$
sp	Scale-independent Pixels - Similar to dp, but also scaled by the user's font size preference

COLORS

values

colors.xml

```
<?xml version="1.0" encoding="utf-8"?>
<resources>
    <color name="black">#FF000000</color>
     <color name="white">#FFFFFFF</color>
</resources>
```





MULȚUMESC

THANK YOU

OBRIGADO

SEE YOU TOMORROW!