# Defensa Hito 3

ALUMNO: SAMUEL ALEJANDRO MALDONADO GARCIA

Crear una APP Android de nombre (DefensaHito3), generar las primeras ACTIVITIES(Pantalla 1 y 2) de la aplicación. Debe estar presente diseño y funcionalidad.



```
<?xml version="1.0" encoding="utf-8"?>
<LinearLayout
xmlns:android="http://schemas.android.com/apk/res/android"
    xmlns:tools="http://schemas.android.com/tools"
    android:layout width="match parent"
    android:layout height="match parent"
    tools:context=".Onboarding.n1"
    android:orientation="vertical">
    <ImageView</pre>
        android:id="@+id/ima"
        android:layout width="wrap content"
        android:layout height="277dp"
        android:layout gravity="center"
        android:layout marginLeft="150dp"
        android:layout marginTop="1dp"
        android:scaleType="centerCrop"
        android:src="@drawable/img1" />
    <TextView
        android:id="@+id/textTitle1"
        android:layout width="match parent"
        android:layout height="wrap content"
        android:layout marginTop="40dp"
        android:fontFamily="sans-serif"
        android:gravity="center"
        android:text="@string/titulo"
        android:textColor="@color/colorPrimary"
        android:textSize="28sp" />
```

Manda a la pantalla 3

Pasa a la pantalla 2

```
<TextView
       android:id="@+id/textlar"
       android:layout_width="match_parent"
       android:layout height="wrap content"
       android:layout marginTop="40dp"
       android:fontFamily="sans-serif"
       android:gravity="center"
       android:text="@string/manejo"
       android:textColor="@color/colorPrimary"
       android:textSize="28sp" />
   <LinearLayout</pre>
       android:id="@+id/layoutNext"
       android:layout_width="match_parent"
       android:layout height="match parent"
       android:orientation="horizontal">
       <Button
           android:id="@+id/skip1"
           android:layout_width="141dp"
           android:layout height="wrap content"
           android:layout gravity="bottom|start"
           android:background="@drawable/stylesnt"
           android:text="@string/skip"
           android:textColor="@color/colorWhite">
       </Button>
       <TextView
            android:id="@+id/textInc"
           android:layout_width="wrap content"
            android:layout height="wrap content"
           android:layout gravity="bottom|start"
           android:layout marginRight="15dp"
           android:layout marginBottom="2dp"
           android:layout_weight="1"
            android:clickable="true"
            android:focusable="true"
            android:fontFamily="sans-serif"
           android:gravity="bottom|end"
           android:text="@string/done"
            android:textColor="@color/colorPrimary"
           android:textSize="20sp"/>
   </LinearLayout>
</LinearLayout>
```

## Código Java pantalla 1

```
package com.example.examenhito3.Onboarding;
public class n1 extends Fragment {
    private ViewPager viewPager;
    private View view;
  TextView textNextFace;
  Button Next;
    public n1() {
       // Required empty public constructor
    @Override
    public View onCreateView(LayoutInflater inflater, ViewGroup container,
                            Bundle savedInstanceState) {
        //initialize viewpager from main activity
       initializeInflater(inflater, container);
        //initialize components
       initializeComponents();
        //add click event to text Next and prev text
        addClickNextAndPrev();
        //return
        return view;
```

```
public void initializeInflater(LayoutInflater inflater, ViewGroup container) {
      view = inflater.inflate(R.layout.fragment n1, container, false);
   public void initializeComponents() {
      viewPager = getActivity().findViewById(R.id.viewPagerContainer);
      textNextFace = view.findViewById(R.id.textInc);
      Next=view.findViewById(R.id.skip1);
   public void addClickNextAndPrev() {
      textNextFace.setOnClickListener(new View.OnClickListener() {
           @Override
           public void onClick(View v) {
              viewPager.setCurrentItem(1);
      });
      Next.setOnClickListener(new View.OnClickListener() {
           @Override
           public void onClick(View v) {
              viewPager.setCurrentItem(2);
      });
```



Manda a la Pasa a la pantalla 3 pantalla 2

```
<?xml version="1.0" encoding="utf-8"?>
<LinearLayout
xmlns:android="http://schemas.android.com/apk/r
es/android"
xmlns:tools="http://schemas.android.com/tools"
    android:layout width="match parent"
    android:layout height="match parent"
    tools:context=".Onboarding.n2"
    android:orientation="vertical">
    <ImageView</pre>
        android:id="@+id/ima"
        android:layout width="wrap content"
        android:layout height="277dp"
        android:layout gravity="center"
        android:layout marginLeft="150dp"
        android:layout marginTop="1dp"
        android:scaleType="centerCrop"
        android:src="@drawable/img2" />
    <TextView
        android:id="@+id/textTitle1"
        android:layout width="match parent"
        android:layout height="wrap_content"
        android:layout marginTop="40dp"
        android:fontFamily="sans-serif"
        android:gravity="center"
        android:text="@string/titulo2"
        android:textColor="@color/colorPrimary"
        android:textSize="28sp" />
 <TextView
        android:id="@+id/textlar"
        android:layout width="match parent"
        android:layout height="wrap_content"
        android:layout marginTop="40dp"
        android:fontFamily="sans-serif"
        android:gravity="center"
        android:text="@string/manejo2"
        android:textColor="@color/colorPrimary"
        android:textSize="28sp" />
```

```
<TextView
        android:id="@+id/gest"
        android:layout width="match parent"
        android:layout height="wrap content"
        android:layout_marginTop="40dp"
        android:fontFamily="sans-serif"
        android:gravity="center"
        android:text="@string/estion"
        android:textColor="@color/colorPrimary"
        android:textSize="28sp" />
    <LinearLayout
        android:id="@+id/layoutNext"
        android:layout width="match parent"
        android:layout height="match parent"
        android:orientation="horizontal">
        <Button
            android:id="@+id/skip2"
           android:layout width="141dp"
            android:layout height="wrap content"
            android:layout_gravity="bottom|start"
            android:background="@drawable/stylesnt"
           android:text="@string/skip"
            android:textColor="@color/colorWhite">
        </Button>
        <TextView
            android:id="@+id/textInc2"
           android:layout width="wrap content"
            android:layout height="wrap content"
            android:layout gravity="bottom|start"
            android:layout marginRight="15dp"
            android:layout marginBottom="2dp"
            android:layout weight="1"
            android:clickable="true"
            android:focusable="true"
            android:fontFamily="sans-serif"
            android:gravity="bottom|end"
            android:text="@string/done"
            android:textColor="@color/colorPrimary"
           android:textSize="20sp" />
    </LinearLavout>
</LinearLayout>
```

## Código Java pantalla 2

```
public class n2 extends Fragment {
    private ViewPager viewPager;
    private View view;
   TextView textNextFace2;
    Button Next2;
    public n2() {
       // Required empty public constructor
    @Override
    public View onCreateView(LayoutInflater inflater, ViewGroup
container,
                             Bundle savedInstanceState) {
       initializeInflater(inflater, container);
       //initialize components
        initializeComponents();
       //add click event to text Next and prev text
        addClickNextAndPrev();
        //return
        return view;
```

```
public void initializeInflater(LayoutInflater inflater, ViewGroup
container) {
        view = inflater.inflate(R.layout.fragment_n2, container,
false);
    public void initializeComponents() {
        viewPager =
getActivity().findViewById(R.id.viewPagerContainer);
        textNextFace2 = view.findViewById(R.id.textInc2);
        Next2=view.findViewById(R.id.skip2);
    public void addClickNextAndPrev() {
        textNextFace2.setOnClickListener(new
View.OnClickListener() {
            @Override
            public void onClick(View v) {
                viewPager.setCurrentItem(2);
        });
        Next2.setOnClickListener(new View.OnClickListener() {
            @Override
            public void onClick(View v) {
                viewPager.setCurrentItem(2);
        });
```

## Adapter

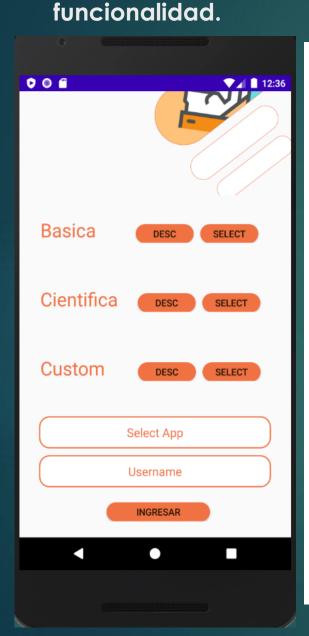
```
public class OnboardingAdapter extends FragmentPagerAdapter
    public OnboardingAdapter(FragmentManager fm)
        super(fm);
    @NonNull
    @Override
    public Fragment getItem(int position)
        switch (position)
            case 0:
                return new n1();
            case 1:
                return new n2();
           case 2:
                return new n3();
           default:
                return null;
    @Override
    public int getCount()
        return 3;
```

Esto es para declarar las posiciones de los fragments

#### Java Main

```
public class MainActivity extends AppCompatActivity
   private ViewPager viewPagerContainer;
   @Override
   protected void onCreate(Bundle savedInstanceState)
       super.onCreate(savedInstanceState);
       setContentView(R.layout.activity_main);
       //initializeComponents
        _initializeComponents();
       //initializeAdapter
        _initializeFragmentAdapter();
   public void _initializeComponents()
       viewPagerContainer = findViewById(R.id.viewPagerContainer);
   public void _initializeFragmentAdapter()
       OnboardingAdapter adapter = new OnboardingAdapter(getSupportFragmentManager());
       viewPagerContainer.setAdapter(adapter);
```

Generar la ACTIVITY de acceso a la aplicación. Debe estar presente diseño y



```
<?xml version="1.0" encoding="utf-8"?>
<LinearLayout</pre>
xmlns:android="http://schemas.android.com/apk/res/andr
    xmlns:tools="http://schemas.android.com/tools"
    android:layout_width="match parent"
   android:layout height="match parent"
    tools:context=".Onboarding.n1"
    android:orientation="vertical">
    <LinearLayout</pre>
        android:layout width="match parent"
        android:layout height="154dp"
        android:gravity="center"
        android:orientation="horizontal">
        <ImageView</pre>
            android:id="@+id/ima"
            android:layout width="wrap content"
            android:layout height="277dp"
            android:layout_gravity="center"
            android:layout marginLeft="200dp"
            android:layout marginBottom="50dp"
            android:scaleType="centerCrop"
            android:src="@drawable/img3" />
    </LinearLayout>
    <LinearLayout</pre>
        android:layout_width="match_parent"
        android:layout height="wrap content"
        android:orientation="horizontal"
        android:padding="32dp">
        <TextView
            android:layout_width="wrap_content"
            android:layout height="wrap content"
            android:fontFamily="sans-serif"
            android:text="@string/asica"
            android:textColor="@color/colorPrimary"
            android:textSize="28sp" />
```

```
<Button
       android:id="@+id/d1"
        android:layout width="wrap content"
       android:layout_height="28dp"
        android:layout marginLeft="60dp"
       android:background="@drawable/stylesnt"
       android:text="@string/Dex" />
   <Button
        android:id="@+id/s1"
       android:layout width="wrap content"
       android:layout_height="28dp"
       android:layout marginLeft="10dp"
       android:background="@drawable/stylesnt"
       android:text="@string/select" />
</LinearLayout>
<LinearLayout</pre>
   android:layout width="match parent"
   android:layout height="wrap content"
   android:orientation="horizontal"
   android:padding="32dp">
   <TextView
       android:layout width="wrap content"
        android:layout height="wrap content"
       android:fontFamily="sans-serif"
       android:text="@string/asica1"
       android:textColor="@color/colorPrimary"
        android:textSize="28sp" />
   <Button
        android:id="@+id/d2"
       android:layout width="wrap content"
       android:layout_height="28dp"
       android:layout marginLeft="30dp"
       android:background="@drawable/stylesnt"
       android:text="@string/Dex" />
   <Button
       android:id="@+id/s2"
       android:layout width="wrap content"
       android:layout height="28dp"
       android:layout_marginLeft="10dp"
        android:background="@drawable/stylesnt"
        android:text="@string/select" />
```

```
</LinearLayout>
<LinearLavout</pre>
    android:layout width="match parent"
    android:layout height="wrap content"
    android:orientation="horizontal"
    android:padding="32dp">
    <TextView
        android:layout width="wrap content"
        android:layout height="wrap content"
        android:fontFamily="sans-serif"
        android:text="@string/asica2"
        android:textColor="@color/colorPrimary"
        android:textSize="28sp" />
    <Button
        android:id="@+id/d3"
        android:layout width="wrap content"
        android:layout height="28dp"
        android:layout marginLeft="50dp"
        android:background="@drawable/stylesnt"
        android:text="@string/Dex" />
    <Button
        android:id="@+id/s3"
        android:layout width="wrap content"
        android:layout height="28dp"
        android:layout marginLeft="10dp"
        android:background="@drawable/stylesnt"
        android:text="@string/select" />
</LinearLayout>
```

```
<EditText
        android:id="@+id/etselect"
        android:layout width="match parent"
        android:layout_height="wrap_content"
        android:layout gravity="center"
        android:layout_marginLeft="30dp"
        android:lavout marginTop="20dp"
        android:layout marginRight="30dp"
        android:background="@drawable/et style"
        android:fontFamily="sans-serif"
        android:hint="@string/selecapp"
        android:textColorHint="@color/colorPrimary"
        android:inputType="textEmailAddress"
        android:textAlignment="center">
    </EditText>
    <EditText
        android:id="@+id/etUsername"
        android:layout width="match parent"
        android:layout_height="wrap_content"
        android:layout gravity="center"
        android:layout_marginLeft="30dp"
        android:layout marginTop="10dp"
        android:layout marginRight="30dp"
        android:background="@drawable/et_style"
        android:fontFamily="sans-serif"
        android:hint="@string/username"
        android:textColorHint="@color/colorPrimary"
        android:textAlignment="center">
    </EditText>
        <LinearLayout</pre>
            android:layout_width="match_parent"
            android:layout height="wrap content"
            android:orientation="horizontal"
            android:padding="22dp"
            android:gravity="center">
            <Button
                android:id="@+id/btnIn"
                android:layout width="157dp"
                android:layout_height="28dp"
                android:layout marginLeft="10dp"
                android:background="@drawable/stylesnt"
                android:text="@string/in" />
        </LinearLayout>
</LinearLayout>
```

## Código Java pantalla 2

```
public class n3 extends Fragment
   private ViewPager viewPager;
   private View view:
   private Button bti,d1,d2,d3,s1,s2,s3;
   private EditText etsel,etUser;
   public n3()
        // Required empty public constructor
   @Override
   public View onCreateView(LayoutInflater inflater, ViewGroup container,
Bundle savedInstanceState)
       //initialize viewpager from main activity
        initializeInflater(inflater, container);
       //initialize components
        initializeComponents();
       //add click event to text Next and prev text
        eventClickAction();
       //return
        return view;
   public void initializeInflater(LayoutInflater inflater, ViewGroup
container)
        view = inflater.inflate(R.layout.fragment n3, container, false);
```

```
public void initializeComponents()
        viewPager = getActivity().findViewById(R.id.viewPagerContainer);
        d1 = view.findViewById(R.id.d1);
        d2 = view.findViewById(R.id.d2);
        d3 = view.findViewById(R.id.d3);
        s1 = view.findViewById(R.id.s1);
        s2 = view.findViewById(R.id.s2);
       s3 = view.findViewById(R.id.s3);
        etsel = view.findViewById(R.id.etselect);
        etUser = view.findViewById(R.id.etUsername);
        bti = view.findViewById(R.id.btnIn);
    public void eventClickAction()
d1.setOnClickListener(new View.OnClickListener() {
    @Override
    public void onClick(View v) {
        Toast.makeText(getActivity(), "Calculadora con operaciones simples básica",
Toast.LENGTH_SHORT).show();
});
        d2.setOnClickListener(new View.OnClickListener() {
            @Override
            public void onClick(View v) {
                Toast.makeText(getActivity(), "Calculadora con operaciones avanzadas",
Toast.LENGTH_SHORT).show();
        });
        d3.setOnClickListener(new View.OnClickListener() {
            @Override
            public void onClick(View v) {
                Toast.makeText(getActivity(), "Calculadora con operaciones para
programadores", Toast.LENGTH SHORT).show();
        });
```

```
bti.setOnClickListener(new View.OnClickListener()
            @Override
            public void onClick(View v)
                String selct = etsel.getText().toString().trim();
                String username = etUser.getText().toString().trim();
                if(username.equals("") || selct .equals(""))
                   Toast.makeText(getActivity(), "Ingrese Select/Username",
Toast.LENGTH_SHORT).show();
                else if(selct.equals("Custom"))
                    Intent intent = new Intent(getActivity(), CalcCustom.class);
                   intent.putExtra("US", username);
                   intent.putExtra("AS", selct);
                   startActivity(intent);
                   getActivity().finish();
                else if(selct.equals("Basica"))
                   Intent intent = new Intent(getActivity(), CalcBasica.class);
                   intent.putExtra("US", username);
                   intent.putExtra("AS", selct);
                   startActivity(intent);
                   getActivity().finish();
                else if(selct.equals("Cientifica"))
                   Intent intent = new Intent(getActivity(), CalcCientiffica.class);
                   intent.putExtra("US", username);
                   intent.putExtra("AS", selct);
                   startActivity(intent);
                   getActivity().finish();
                else{
                   Toast.makeText(getActivity(), "Seleccione alguna calculadora",
Toast.LENGTH SHORT).show();
       });
```

#### Implementar una APP calculadora CUSTOM.



```
<?xml version="1.0" encoding="utf-8"?>
<LinearLayout
xmlns:android="http://schemas.android.com/apk/res/android
    xmlns:app="http://schemas.android.com/apk/res-auto"
    xmlns:tools="http://schemas.android.com/tools"
    android:layout width="match parent"
    android:layout_height="match_parent"
   tools:context=".MainActivity"
    android:orientation="vertical"
    android:gravity="center"
    android:layout marginLeft="20dp"
    android:layout_marginRight="20dp"
    android:layout marginTop="20dp">
    <LinearLayout
        android:layout width="254dp"
        android:layout height="wrap content"
        android:layout gravity="center"
        android:orientation="vertical"
        android:padding="50px">
        <TextView
            android:id="@+id/tvShowU2"
            android:layout_width="match_parent"
            android:layout height="wrap content"
            android:textColor="@color/colorPrimary"
            android:textSize="20sp">
        </TextView>
        <TextView
            android:id="@+id/tvShowS2"
            android:layout width="match parent"
            android:layout height="wrap content"
            android:textColor="@color/colorPrimary"
            android:textSize="20sp">
        </TextView>
    </LinearLayout>
```

```
<LinearLayout</pre>
    android:layout width="match parent"
    android:layout height="wrap content"
    android:orientation="vertical"
    android:layout gravity="center"
    android:layout marginTop="20dp">
    <EditText
        android:id="@+id/txt"
        android:background="@drawable/et style"
        android:layout width="match parent"
        android:layout height="wrap content"
        android:layout marginRight="20dp"
        android:layout_marginLeft="20dp"
        android:layout marginBottom="20dp"/>
</LinearLayout>
<LinearLavout
    android:layout width="wrap content"
    android:layout_height="wrap_content"
    android:orientation="vertical"
    android:layout gravity="center">
    <LinearLayout
        android:layout width="match parent"
        android:layout_height="wrap_content"
        android:orientation="horizontal"
        android:gravity="center">
        <Button
            android:id="@+id/c1"
            android:layout_marginRight="10px"
            android:background="@drawable/stylesnt"
            android:layout width="wrap content"
            android:layout height="wrap content"
            android:text="x2" />
```

```
<Button
        android:id="@+id/c2"
        android:layout marginRight="10px"
        android:background="@drawable/stylesnt"
        android:layout width="wrap content"
        android:layout height="wrap content"
        android:text="x3" />
    <Button
        android:id="@+id/c3"
       android:layout marginRight="10px"
        android:background="@drawable/stylesnt"
        android:layout width="wrap content"
        android:layout height="wrap content"
        android:text="!n" />
    <Button
        android:id="@+id/c4"
        android:layout marginRight="10px"
        android:background="@drawable/stylesnt"
        android:layout width="wrap content"
        android:layout height="wrap content"
       android:text="Σn" />
</LinearLayout>
<LinearLayout</pre>
    android:layout width="match parent"
    android:layout height="wrap content"
    android:orientation="horizontal"
    android:gravity="center">
    <Button
        android:id="@+id/nt1"
       android:layout marginRight="10px"
        android:background="@drawable/stylesnt"
        android:layout width="wrap content"
        android:layout height="wrap content"
        android:text="1" />
```

```
<Button
           android:id="@+id/nt2"
           android:layout marginRight="10px"
           android:background="@drawable/stylesnt"
           android:layout width="wrap content"
           android:layout height="wrap_content"
           android:text="2" />
       <Button
           android:id="@+id/nt3"
           android:layout marginRight="10px"
           android:background="@drawable/stylesnt"
           android:layout width="wrap content"
           android:layout height="wrap_content"
           android:text="3 " />
       <Button
           android:id="@+id/nt4"
          android:layout marginRight="10px"
           android:background="@drawable/stylesnt"
           android:layout width="wrap content"
           android:layout height="wrap content"
           android:text="4 " />
  </LinearLayout>
   <LinearLayout
      android:layout width="match_parent"
      android:layout height="wrap content"
      android:orientation="horizontal"
      android:gravity="center">
       <Button
           android:id="@+id/nt0"
           android:layout marginRight="10px"
           android:background="@drawable/stylesnt"
           android:layout width="wrap content"
           android:layout height="wrap_content"
           android:text="0" />
```

```
<Button
            android:id="@+id/ntshf"
            android:layout marginRight="10px"
            android:background="@drawable/shiftstyle"
            android:layout width="wrap content"
            android:layout height="wrap content"
            android:text="Shift" />
        <Button
            android:id="@+id/ntclean"
            android:background="@drawable/stylesnt"
            android:layout width="wrap content"
            android:layout height="wrap content"
            android:text="Clean" />
    </LinearLayout>
</LinearLayout>
<LinearLayout</pre>
    android:layout width="match parent"
    android:layout height="wrap content"
    android:orientation="horizontal">
    <Button
        android:id="@+id/ntmas"
        android:layout marginRight="10px"
        android:background="@drawable/stylesnt"
        android:layout width="wrap content"
        android:layout height="wrap content"
        android:text="@string/mas" />
    <Button
        android:id="@+id/ntmenos"
        android:layout marginRight="10px"
        android:background="@drawable/stylesnt"
        android:layout width="wrap content"
        android:layout height="wrap content"
        android:text="@string/menos" />
    <Button
        android:id="@+id/ntdi"
        android:background="@drawable/stylesnt"
        android:layout width="wrap content"
        android:layout height="wrap content"
        android:text="@string/di" />
   />
```

```
<Button
            android:id="@+id/ntmulti"
            android:layout marginRight="10px"
            android:background="@drawable/stylesnt"
            android:layout_width="wrap_content"
            android:layout height="wrap content"
            android:text="@string/multi" />/>
    </LinearLayout>
    <LinearLayout</pre>
        android:layout width="match parent"
        android:layout height="wrap content"
        android:orientation="horizontal"
        android:gravity="center">
        <Button
            android:id="@+id/ntiual"
            android:background="@drawable/stylesnt"
            android:layout_width="wrap_content"
            android:layout height="wrap content"
            android:text="=" />
    </LinearLavout>
    <LinearLayout</pre>
        android:layout width="match parent"
        android:layout height="wrap content"
        android:orientation="horizontal"
        android:gravity="center">
        <Button
            android:id="@+id/cls"
            android:layout width="177dp"
            android:layout_height="wrap_content"
            android:background="@drawable/stylesnt"
            android:text="Close App" />
    </LinearLayout>
</LinearLayout>
```

#### Código Java calc Custom

```
Public class CalcCustom extends AppCompatActivity implements
View.OnClickListener {
    private EditText txt;
    private Button cerrar,
btn1,btn2,btn3,btn4,btn0,btncl,btnshift,btsuma,btnigual,btres,
btmulti, btdi, cm1, cm2, cm3, cm4;
    int operaciones;
    double operan1, operan2;
    double operan3=1;
    double operan4=0;
    double resul;
    int clicks = 1;
    private TextView tvShowU2,tvShows2;
    @Override
    protected void onCreate(Bundle savedInstanceState) {
        super.onCreate(savedInstanceState);
        setContentView(R.layout.activity calc custom);
        initializeVariables();
    public void initializeVariables(){
        tvShowU2 = findViewById(R.id.tvShowU2);
        tvShows2 = findViewById(R.id.tvShowS2);
        String username = getIntent().getStringExtra("US");
        String select = getIntent().getStringExtra("AS");
        String msg1 = "App: " + select;
        String msg = "Bienvenido: " + username;
        tvShowU2.setText(msg);
        tvShows2.setText(msg1);
```

```
btn1 = findViewById(R.id.nt1);
  btn2=findViewById(R.id.nt2);
  btn3 = findViewById(R.id.nt3);
  btn4 = findViewById(R.id.nt4);
  btn0=findViewById(R.id.nt0);
  btsuma= findViewById(R.id.ntmas);
  btres= findViewById(R.id.ntmenos);
  btmulti=findViewById(R.id.ntmulti);
  btdi=findViewById(R.id.ntdi);
  txt = findViewById(R.id.txt);
  btnigual=findViewById(R.id.ntiual);
  btnshift=findViewById(R.id.ntshf);
  cm1=findViewById(R.id.c1);
  cm2=findViewById(R.id.c2);
  cm3=findViewById(R.id.c3);
  cm4=findViewById(R.id.c4);
  cerrar=findViewById(R.id.cls);
  btncl=findViewById(R.id.ntclean);
  cerrar.setOnClickListener(this);
  btncl.setOnClickListener(this);
  btnigual.setOnClickListener(this);
  btn1.setOnClickListener(this);
  btn2.setOnClickListener(this);
  btn3.setOnClickListener(this);
  btn4.setOnClickListener(this);
  btnshift.setOnClickListener(this);
  cm1.setOnClickListener(this);
  cm2.setOnClickListener(this);
  cm3.setOnClickListener(this):
  cm4.setOnClickListener(this);
  btn0.setOnClickListener(this);
  btsuma.setOnClickListener(this);
  btres.setOnClickListener(this);
  btmulti.setOnClickListener(this);
  btdi.setOnClickListener(this);
```

```
@Override
public void onClick(View v) {
    switch (v.getId()) {
        case R.id.cls:
        finish();
        break:
        case R.id.ntclean:
            txt.setText("");
            break;
        case R.id.nt1:
            String dato = txt.getText().toString();
            dato = dato + "1";
            txt.setText(dato);
            break;
        case R.id.nt2:
            String dato1 = txt.getText().toString();
            dato1 = dato1 + "2";
            txt.setText(dato1);
            break;
        case R.id.nt3:
            String dato2 = txt.getText().toString();
            dato2 = dato2 + "3";
            txt.setText(dato2);
            break;
```

```
case R.id.nt4:
    String dato4 = txt.getText().toString();
    dato4 = dato4 + "4";
   txt.setText(dato4);
    break:
case R.id.nt0:
    String dato3 = txt.getText().toString();
    dato3 = dato3 + "0";
    txt.setText(dato3);
    break:
case R.id.ntmas:
    String sum = txt.getText().toString();
    if (sum.equals("")) {
        Toast.makeText(this, "Introducir números", Toast.LENGTH SHORT).show();
    } else {
        operan1 = operan1 + Double.parseDouble(sum);
        txt.setText("");
        operaciones = 1;
    break;
case R.id.ntmenos:
    operan1 = 0;
   if (operan4 < 1) {
        String auxi = txt.getText().toString();
        operan1 = Double.parseDouble(auxi) - operan1;
        operan3 = operan1;
   } else if (operan4 > 0) {
        String auxi = txt.getText().toString();
        operan1 = operan3 - Double.parseDouble(auxi);
    operan4++;
   txt.setText("");
    operaciones = 2;
    break:
```

```
case R.id.ntmulti:
   operan1 = 1;
   String multi = txt.getText().toString();
   operan1 = operan3 * Double.parseDouble(multi);
   operan3 = operan1;
   txt.setText("");
   operaciones = 3;
   break;
case R.id.ntdi:
   if (operan4 < 1) {
       String di = txt.getText().toString();
       operan1 = Double.parseDouble(di) / operan3;
       operan3 = operan1;
   } else {
       String di = txt.getText().toString();
       operan1 = operan3 / Double.parseDouble(di);
       operan3 = operan1;
   }
   operan4++;
   txt.setText("");
   operaciones = 4;
   break;
case R.id.c2:
   String auxcm4;
   auxcm4 = cm2.getText().toString();
   if (auxcm4.equals("x3")) {
       Double res, res1;
       String cua = txt.getText().toString();
       res = Double.parseDouble(cua);
       res1 = Math.pow(res, 3);
       txt.setText("" + res1);
   }
   else{
       String par = txt.getText().toString();
       operan1 = Double.parseDouble(par);
       txt.setText("");
       operaciones = 5;
   break;
```

```
case R.id.c1:
   String axcm1;
   axcm1 = cm1.getText().toString();
   if (axcm1.equals("x2")) {
       Double res, res1;
       String cua = txt.getText().toString();
       res = Double.parseDouble(cua);
       res1 = Math.pow(res, 2);
       txt.setText("" + res1);
   } else {
       Double res, res1;
       String cua = txt.getText().toString();
       res = Double.parseDouble(cua);
       res1 = Math.pow(res, 3);
       txt.setText("" + res1);
   break;
```

```
case R.id.c3:
    String auxcm3;
    auxcm3 = cm3.getText().toString();
    if (auxcm3.equals("!n")) {
        double factorial = 1;
        String fac = txt.getText().toString();
        Double op11 = Double.parseDouble(fac);
        for (double i = op11; i > 0; i--) {
            factorial = factorial * i;
        txt.setText("" + factorial);
    else{
        try {
            String auxi = txt.getText().toString();
            operan1 = Double.parseDouble(auxi);
            int cw =0;
            int w1 =1;
            int w2;
            int sums =0;
            for(double i = 1;i<=operan1;i++)</pre>
                w2 = cw;
                cw = w1 + cw;
                w1 = w2;
                sums = sums + w1;
            txt.setText(""+sums);
            operan1=0;
        catch (Exception E)
            Toast.makeText(getApplicationContext(), "Revise los
datos", Toast.LENGTH_LONG();
    break:
```

```
case R.id.c4:
    String acm4;
    acm4 = cm4.getText().toString();
   if (acm4.equals("Σn")) {
       try {
            double ar=0;
            String auxi = txt.getText().toString();
            Double aux11 = Double.parseDouble(auxi);
            for(Double i = aux11;i>0;i--)
                ar = ar + i;
            txt.setText(""+ar);
        catch (Exception a)
            Toast.makeText(getApplicationContext(),"Revise los
datos", Toast.LENGTH LONG).show();
       }}
    else{
        try {
            String auxi = txt.getText().toString();
            operan1 = Double.parseDouble(auxi);
            txt.setText("");
            operaciones=6;
        catch (Exception a)
            Toast.makeText(getApplicationContext(), "Revise los
datos",Toast.LENGTH_LONG).show();
        break;
```

```
case R.id.ntshf:
    clicks++;
    if(clicks%2==0){
        datosbtones2();
    else {
        datosbtones1();
    break;
case R.id.ntiual:
    String captura = txt.getText().toString();
    if (captura.equals("")) {
       Toast.makeText(this, "Introducir números",
Toast.LENGTH_SHORT).show();
    else{
        operan2 = Double.parseDouble(captura);
        txt.setText("");
        if (operaciones == 1) {
            resul = operan1 + operan2;
        else if (operaciones == 2)
            resul = operan1 - operan2;
        else if (operaciones == 3)
            resul = operan1 * operan2;
        else if (operaciones == 4)
            if (operaciones == 0) {
                txt.setText("Error al ingresar");
            else {
                resul = operan1 / operan2;
        else if (operaciones == 5) {
            resul =Math.pow(operan1,operan2);
```

```
public void datosbtones1(){
    cm1.setText("x2");
    cm2.setText("x3");
    cm3.setText("!n");
    cm4.setText("\summan");
}

public void datosbtones2(){
    cm1.setText("x3");
    cm2.setText("XY");
    cm3.setText("\summan");
}

cm4.setText("\summan");
}
```

## Strings

```
<string name="app name">Examenhito3</string>
<string name="titulo">SOME</string>
<string name="titulo2">DEFENSA HITO 3</string>
<string name="manejo2">Univ:Samuel Maldonado</string>
<string name="estion">Gestion:2020</string>
<string name="done">Next</string>>
<string name="skip">Skip</string>
<string name="asica">Basica</string>
<string name="asica1">Cientifica</string>
<string name="asica2">Custom</string>
<string name="selecapp">Select App</string>
<string name="username">Username</string>
<string name="in">Ingresar</string>
<string name="select">Select</string>
<string name="Dex">Desc</string>
<string name="manejo">Manejo de events, functions, activities y navigattion entre
screens</string>
<string name="mas">+</string>
<string name="menos">-</string>
<string name="multi">*</string>
<string name="di">/</string>
<string name="nume1">1</string>
<string name="nume2">2</string>
<string name="nume3">3</string>
<string name="nume4">4</string>
<string name="nume5">5</string>
<string name="nume6">6</string>
<string name="nume7">7</string>
<string name="nume8">8</string>
<string name="nume9">9</string>
<string name="nume0">0</string>
<string name="masmenos">+/-</string>
<string name="punto">.</string>
```

```
<string name="iual">=</string>
<string name="mass">+</string>
<string name="menoss">-</string>
<string name="multii">*</string>
<string name="dis">/</string>
<string name="c">C</string>
<string name="c">C</string>
<string name="c2">C</string>
<string name="flecha">(-</string>
<string name="flecha">(-</string>
<string name="cuadrado">x2</string>
<string name="cuadrado">x2</string>
<string name="porcentaje">%</string>
<string name="R">R</string></string></string></string></string>
```

## Estilos y colores

<shape xmlns:android="http://schemas.android.com/apk/res/android">

<stroke android:width="1dp" android:color="@color/colorPrimary"/>

<solid android:color="@color/colorPrimary"/>

<?xml version="1.0" encoding="utf-8"?>

<corners android:radius="15dp"/>

</shape>

```
<color name="colorWhite">#FFFFFF<//color>
 <color name="colorPrimary">#F07243
 </color>
 <color name="colorPrimaryDark">#3700B3</color>
 <color name="colorAccent">#03DAC5</color>
<style name="AppTheme" parent="Theme.AppCompat.Light.NoActionBar">
    <!-- Customize your theme here. -->
    <item name="colorPrimary">@color/colorPrimary</item>
    <item name="colorPrimaryDark">@color/colorPrimaryDark</item>
    <item name="colorAccent">@color/colorAccent</item>
</style>
<?xml version="1.0" encoding="utf-8"?>
<shape xmlns:android="http://schemas.android.com/apk/res/android">
    <solid android:color="@color/colorAccent"/>
    <corners android:radius="15dp"/>
    <stroke android:width="1dp" android:color="@color/colorAccent"/>
</shape>
```