

## 8. Create an android application to demonstrate GridView.

### Activity\_main.xml

```
<?xml version="1.0" encoding="utf-8"?>
<GridView xmlns:android="http://schemas.android.com/apk/res/android"
    android:id="@+id/gridview"
    android:layout_width="fill_parent"
    android:layout_height="fill_parent"
    android:columnWidth="120dp"
    android:numColumns="3"
    android:verticalSpacing="10dp"
    android:horizontalSpacing="10dp"
    android:stretchMode="columnWidth"
    android:gravity="center" />
```

### MainActivity.java

```
package com.example.image;

import androidx.appcompat.app.AppCompatActivity;
import android.os.Bundle;
import android.app.Activity;
import android.view.Menu;
import android.widget.GridView;
public class MainActivity extends Activity {
    @Override
    protected void onCreate(Bundle
        savedInstanceState) {
        super.onCreate(savedInstanceState);
        setContentView(R.layout.activity_main);

        GridView gridview = (GridView)
            findViewById(R.id.gridview);
        gridview.setAdapter(new
            ImageAdapter(this));
    }
}
```

### ImageAdaptor.java

```
package com.example.image;
import android.content.Context;
import android.view.View;
import android.view.ViewGroup;
import android.widget.BaseAdapter;
```

```

import android.widget.GridView;
import android.widget.ImageView;
class ImageAdapter extends BaseAdapter {
    private Context mContext;
    // Constructor
    public ImageAdapter(Context c) {
        mContext = c;
    }

    public int getCount() {
        return picIds.length;
    }

    public Object getItem(int position) {
        return null;
    }
    public long getItemId(int position) {
        return 0;
    }
    public View getView(int position, View
        convertView, ViewGroup parent) {
        ImageView imageView;
        if (convertView == null) {
            imageView = new ImageView(mContext);
            imageView.setLayoutParams(new
                GridView.LayoutParams(200, 180));

            imageView.setScaleType(ImageView.ScaleType.CENTER_CROP);
            imageView.setPadding(8, 8, 8, 8);
        }
        else
        {
            imageView = (ImageView) convertView;

        }
        imageView.setImageResource(picIds[position]);
        return imageView;
    }
    public Integer[] picIds = {
        R.drawable.sample2,
        // R.drawable.sample3,
        R.drawable.sample4,
        R.drawable.sample5,
        R.drawable.sample6,
        R.drawable.sample7,
        R.drawable.sample0,
    }
}

```

```

R.drawable.sample1,
R.drawable.sample2,
//R.drawable.sample3,
R.drawable.sample8,
R.drawable.sample9,
R.drawable.sample10,
R.drawable.sample11,
R.drawable.sample12,
R.drawable.sample13,
R.drawable.sample14,
//R.drawable.sample3,
R.drawable.sample15,
R.drawable.sample5,
R.drawable.sample6,
R.drawable.sample7,
R.drawable.sample0,
R.drawable.sample1
};
}

```

## OUTPUT

