# 2. Starting new Project

- 1. Create a new project in **Android Studio** from **File**  $\Rightarrow$  **New Project** by filling the required details. When it prompts you to select the activity, choose **Empty Activity** and continue.
- 2. Open **build.gradle** located in app level and add below dependencies. I am adding Glide image library dependency. This is not needed for navigation drawer, but to load the profile image from url.

### build.gradle

```
dependencies {
    compile fileTree(dir: 'libs', include: ['*.jar'])
    compile 'com.android.support:appcompat-v7:24.0.0-beta1'
    compile 'com.android.support:design:24.0.0-beta1'
    compile 'com.android.support:support-v4:24.0.0-beta1'

    // Glide image library
    compile 'com.github.bumptech.glide:glide:3.7.0'
}
```

3. Open strings.xml, dimens.xml, colors.xml located under res ⇒ values and add the below values.

#### strings.xml

```
<resources>
   <string name="app name">Navigation Drawer</string>
    <string name="navigation_drawer_open">Open navigation drawer</string>
    <string name="navigation drawer close">Close navigation drawer</string>
    <string name="openDrawer">open drawer</string>
    <string name="closeDrawer">close drawer</string>
    <!-- Navigation Drawer menu labels -->
    <string name="nav home">Home</string>
    <string name="nav photos">Photos</string>
    <string name="nav movies">Movies</string>
    <string name="nav_notifications">Notifications
    <string name="nav settings">Settings</string>
    <string name="nav about us">About Us</string>
    <!-- Toolbar titles when navigation menu item is selected -->
    <string-array name="nav item activity titles">
        <item>Home</item>
        <item>Photos</item>
        <item>Movies</item>
        <item>Notifications</item>
        <item>Settings</item>
    </string-array>
    <string name="activity title about us">About Us</string>
    <string name="activity title privacy policy">Privacy Policy</string>
    <string name="action clear all">Clear All</string>
```

```
<string name="action logout">Logout</string>
    <string name="action mark all read">Mark All as Read</string>
    <string name="privacy policy">Privacy Policy</string>
</resources>
                                 dimens.xml
<resources>
    <!-- Default screen margins, per the Android Design guidelines. -->
    <dimen name="nav_header_vertical_spacing">16dp</dimen>
    <dimen name="nav header height">160dp</dimen>
    <!-- Default screen margins, per the Android Design guidelines. -->
    <dimen name="activity horizontal margin">16dp</dimen>
    <dimen name="activity vertical margin">16dp</dimen>
    <dimen name="fab margin">16dp</dimen>
    <dimen name="profile width">75dp</dimen>
    <dimen name="profile height">75dp</dimen>
</resources>
                     colors.xml
<?xml version="1.0" encoding="utf-8"?>
<resources>
    <color name="colorPrimary">#d32f2f</color>
    <color name="colorPrimaryDark">#c72c2c</color>
    <color name="colorAccent">#FFFFFF<//color>
</resources>
```

- **4**. Download <u>Home</u>, <u>Photos</u>, <u>Movies</u>, <u>Notifications</u>, <u>Settings</u> icons from <u>Material Icons</u> and add them to your project's **res** folder. These icons will be used as navigation menu item icons.
- **5**. Under  $res \Rightarrow menu$  directory, create two menu xml files named **notifications.xml** and **main.xml**. These menus are used to render different toolbar overflow menus when the user switches between navigation drawer items.

```
notifications.xml
<?xml version="1.0" encoding="utf-8"?>
<menu xmlns:android="http://schemas.android.com/apk/res/android"</pre>
    xmlns:app="http://schemas.android.com/apk/res-auto">
    <item
        android:id="@+id/action mark all read"
        android:orderInCategory="100"
        android:title="@string/action_mark_all_read"
        app:showAsAction="never" />
    <item
        android:id="@+id/action clear notifications"
        android:orderInCategory="101"
        android:title="@string/action_clear_all"
        app:showAsAction="never" />
</menu>
                          main.xml
<?xml version="1.0" encoding="utf-8"?>
<menu xmlns:android="http://schemas.android.com/apk/res/android"</pre>
    xmlns:app="http://schemas.android.com/apk/res-auto">
    <item
```

```
android:id="@+id/action_logout"
android:orderInCategory="100"
android:title="@string/action_logout"
app:showAsAction="never" />
</menu>
```

# **Creating Fragments & Activities**

- 6. Create three packages named activity, fragment, other and move the MainActivity.java to activity package.
- 7. Create all the fragment classes needed for navigation menu. Overall I am creating five fragment classes. **Right click** on **fragment** package, **New** ⇒ **Fragment** ⇒ **Fragment** (**Blank**) and name it as **HomeFragment.java**. This fragment will be loaded always whenever user open the app.

Likewise create other fragment activities named **PhotosFragment**, **MoviesFragment**, **NotificationsFragment** and **SettingsFragment**.

- 8. In our navigation drawer menu, there are two other menu items, **About Us** and **Privacy Policy**. For these two we are gonna create activities instead of fragments. Create new two **activities** named **AboutUsActivity.java** and **PrivacyPolicyActivity.java**.
- **9**. Inside **other** package, create a class named **CircleTransform.java** This class is used to display the profile image in circular fashion.

#### CircleTransform.java

```
package com.coderbd.navigationdrawer.other;
import android.content.Context;
import android.graphics.Bitmap;
import android.graphics.BitmapShader;
import android.graphics.Canvas;
import android.graphics.Paint;

import com.bumptech.glide.load.engine.bitmap_recycle.BitmapPool;
import com.bumptech.glide.load.resource.bitmap.BitmapTransformation;

/**
    * Created by Lincoln on 10/03/16.
    */
public class CircleTransform extends BitmapTransformation {
        public CircleTransform(Context context) {
            super(context);
        }

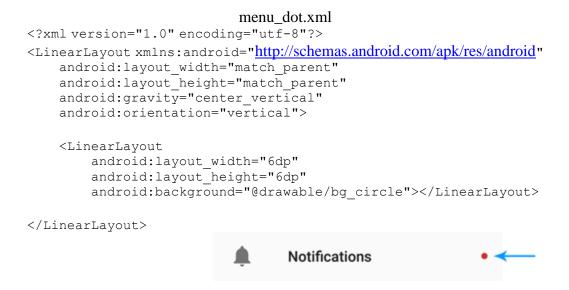
        @Override
        protected Bitmap transform(BitmapPool pool, Bitmap toTransform, int
```

```
outWidth, int outHeight) {
        return circleCrop(pool, toTransform);
   private static Bitmap circleCrop(BitmapPool pool, Bitmap source) {
        if (source == null) return null;
        int size = Math.min(source.getWidth(), source.getHeight());
        int x = (source.getWidth() - size) / 2;
        int y = (source.getHeight() - size) / 2;
        // TODO this could be acquired from the pool too
        Bitmap squared = Bitmap.createBitmap(source, x, y, size, size);
        Bitmap result = pool.get(size, size, Bitmap.Config.ARGB 8888);
        if (result == null) {
            result = Bitmap.createBitmap(size, size,
Bitmap.Config.ARGB 8888);
        Canvas canvas = new Canvas (result);
        Paint paint = new Paint();
        paint.setShader(new BitmapShader(squared, BitmapShader.TileMode.CLAMP,
BitmapShader.TileMode.CLAMP));
       paint.setAntiAlias(true);
       float r = size / 2f;
       canvas.drawCircle(r, r, r, paint);
        return result;
    }
    @Override
   public String getId() {
       return getClass().getName();
    }
}
```

# **10**. Under **res** ⇒ **drawable**, create a file named **bg\_circle.xml**. This provides circular background to view.

```
bg_circle.xml
<?xml version="1.0" encoding="utf-8"?>
<shape
    xmlns:android="http://schemas.android.com/apk/res/android"
    android:shape="oval">
    <solid
        android:color="@color/colorPrimary"/>
        <size
            android:width="120dp"
            android:height="120dp"/>
</shape>
```

**11**. Under **res layout** folder, create a layout named **menu\_dot.xml**. This layout is used to render dot next to notifications label.



# **Adding Navigation Drawer**

12. Under res ⇒ menu directory, create a menu xml file named activity\_main\_drawer.xml. This menu renders the Navigation Drawer list items. Here we set the icons and labels. You can also notice here <group> is used to combine multiple items under single levels. An <item> also can be used group multiple child items with a title. This provides a horizontal separator between the two sets.

```
activity_main_drawer.xml
<?xml version="1.0" encoding="utf-8"?>
<menu xmlns:android="http://schemas.android.com/apk/res/android">
    <group android:checkableBehavior="single">
        <item
            android:id="@+id/nav home"
            android:icon="@drawable/ic home black 24dp"
            android:title="@string/nav_home"/>
            android:id="@+id/nav photos"
            android:icon="@drawable/ic photo library black 24dp"
            android:title="@string/nav photos"/>
        <item
            android:id="@+id/nav movies"
            android:icon="@drawable/ic local movies black 24dp"
            android:title="@string/nav_movies"/>
        <item
            android:id="@+id/nav notifications"
            android:icon="@drawable/ic notifications black 24dp"
            android:title="@string/nav notifications"/>
```

**13**. Under **res** ⇒ **layout**, create a file named **nav\_header\_main.xml** This layout renders the navigation drawer header part with a profile image, name and website.

```
nav_header_main.xml
<?xml version="1.0" encoding="utf-8"?>
<RelativeLayout xmlns:android="http://schemas.android.com/apk/res/android"</pre>
    xmlns:app="http://schemas.android.com/apk/res-auto"
    android:id="@+id/view container"
    android:layout width="match parent"
    android:layout height="@dimen/nav header height"
    android:gravity="bottom"
    android:orientation="vertical"
    android: theme="@style/ThemeOverlay.AppCompat.Dark">
    <ImageView</pre>
        android:id="@+id/img header bg"
        android:layout width="match parent"
        android:layout height="match parent"
        android:scaleType="fitXY"
        android:src="@mipmap/ic launcher"/>
    <LinearLayout
        android:layout width="wrap content"
        android:layout_height="wrap content"
        android:layout centerVertical="true"
        android:orientation="vertical"
        android:padding="@dimen/activity horizontal margin">
        <ImageView</pre>
            android:id="@+id/img profile"
            android:layout width="@dimen/profile width"
            android:layout height="@dimen/profile height"
            android:paddingTop="@dimen/nav_header_vertical_spacing"
            app:srcCompat="@android:drawable/sym def app icon" />
```

**14.** Now we'll create another layout file to add required **Toolbar**, **FAB** and **FrameLayout**. FrameLayout is used to load appropriate fragment when an item is selected from nav menu. Create a layout file named **app\_bar\_main.xml** under **res** ⇒ **layout**.

```
app_bar_main.xml
<?xml version="1.0" encoding="utf-8"?>
<android.support.design.widget.CoordinatorLayout</pre>
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"
    android:fitsSystemWindows="true"
    tools:context="com.coderbd.navigationdrawer.activity.MainActivity">
    <android.support.design.widget.AppBarLayout</pre>
        android:layout width="match parent"
        android:layout height="wrap content"
        android:theme="@style/AppTheme.AppBarOverlay">
        <android.support.v7.widget.Toolbar</pre>
            android:id="@+id/toolbar"
            android:layout width="match parent"
            android:layout height="?attr/actionBarSize"
            android:background="?attr/colorPrimary"
            app:popupTheme="@style/AppTheme.PopupOverlay"/>
    </android.support.design.widget.AppBarLayout>
    <FrameLayout
        android:id="@+id/frame"
        android:layout width="match parent"
        android:layout height="match parent"
        app:layout behavior="@string/appbar scrolling view behavior"></FrameL
ayout>
    <android.support.design.widget.FloatingActionButton</pre>
```

android:id="@+id/fab"

```
android:layout_width="wrap_content"
android:layout_height="wrap_content"
android:layout_gravity="bottom|end"
android:layout_margin="@dimen/fab_margin"
app:backgroundTint="@color/colorPrimary"
app:srcCompat="@android:drawable/ic_dialog_email" />
```

</android.support.design.widget.CoordinatorLayout>

15. Open the layout file your main activity activity main.xml and add NavigationView element. You can notice that the toolbar layout is added using <include> tag.

#### activity\_main.xml

```
<?xml version="1.0" encoding="utf-8"?>
<android.support.v4.widget.DrawerLayout</pre>
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:id="@+id/drawer layout"
    android:layout width="match parent"
    android:layout height="match parent"
    android: fitsSystemWindows="true"
    tools:openDrawer="start">
    <include
        layout="@layout/app bar main"
        android:layout width="match parent"
        android:layout height="match parent" />
    <android.support.design.widget.NavigationView</pre>
        android:id="@+id/nav view"
        android:layout width="wrap content"
        android:layout height="match parent"
        android:layout gravity="start"
        android: fitsSystemWindows="true"
        app:headerLayout="@layout/nav header main"
        app:menu="@menu/activity main drawer"/>
```

</android.support.v4.widget.DrawerLayout>

16. Now we have all the required elements in place. It's time to open the main activity and do the necessary changes to make the navigation drawer functional. Open **MainActivity.java** and modify as explained below.

**setUpNavigationView()** – Initializes the Navigation Drawer by creating necessary click listeners and other functions.

**loadNavHeader**() – Function loads the navigation drawer header information like profile image, name and website. Here we use Glide image library to load the profile image.

**getHomeFragment()** – Returns the appropriate Fragment depending on the nav menu item user selected. For example if user selects **Photos** from nav menu, it returns **PhotosFragment**. This can be done by using the variable *navItemIndex*.

**loadHomeFragment()** – Loads the fragment returned from **getHomeFragment()** function into **FrameLayout**. It also takes care of other things like changing the toolbar title, hiding / showing fab, invalidating the options menu so that new menu can be loaded for different fragment.

Other code is very easy to understand and self explanatory. I have also added comments to each code block for better understanding.

#### MainActivity.java

```
package com.coderbd.navigationdrawer.activity;
import android.content.Intent;
import android.os.Bundle;
import android.os.Handler;
import android.support.design.widget.FloatingActionButton;
import android.support.design.widget.NavigationView;
import android.support.design.widget.Snackbar;
import android.support.v4.app.Fragment;
import android.support.v4.app.FragmentTransaction;
import android.support.v4.view.GravityCompat;
import android.support.v4.widget.DrawerLayout;
import android.support.v7.app.ActionBarDrawerToggle;
import android.support.v7.app.AppCompatActivity;
import android.support.v7.widget.Toolbar;
import android.view.Menu;
import android.view.MenuItem;
import android.view.View;
import android.widget.ImageView;
import android.widget.TextView;
import android.widget.Toast;
import com.bumptech.glide.Glide;
import com.bumptech.glide.load.engine.DiskCacheStrategy;
import com.coderbd.navigationdrawer.R;
import com.coderbd.navigationdrawer.fragment.HomeFragment;
import com.coderbd.navigationdrawer.fragment.MoviesFragment;
import com.coderbd.navigationdrawer.fragment.NotificationsFragment;
import com.coderbd.navigationdrawer.fragment.PhotosFragment;
import com.coderbd.navigationdrawer.fragment.SettingsFragment;
import com.coderbd.navigationdrawer.other.CircleTransform;
public class MainActivity extends AppCompatActivity {
   private NavigationView navigationView;
   private DrawerLayout drawer;
   private View navHeader;
    private ImageView imgNavHeaderBg, imgProfile;
    private TextView txtName, txtWebsite;
    private Toolbar toolbar;
```

```
private FloatingActionButton fab;
    // urls to load navigation header background image
    // and profile image
   private static final String urlNavHeaderBg =
"https://static1.squarespace.com/static/55c263c0e4b0ad74cc
f2c9a9/t/55fadbbde4b01c49490d7b18/1442503622299/Backgroun
ds+for+Site UX+BG+Small+Icons.png?format=2500w";
    private static final String urlProfileImg = "https://encrypted-
tbn0.gstatic.com/images?q=tbn:ANd9GcScuIluC7jOsZE5DRJi7x3
SRPmLJxSKw7GOazGouLqxwCDtRrASmQ";
    // index to identify current nav menu item
   public static int navItemIndex = 0;
    // tags used to attach the fragments
   private static final String TAG HOME = "home";
   private static final String TAG PHOTOS = "photos";
   private static final String TAG_MOVIES = "movies";
   private static final String TAG NOTIFICATIONS = "notifications";
   private static final String TAG SETTINGS = "settings";
   public static String CURRENT TAG = TAG HOME;
    // toolbar titles respected to selected nav menu item
   private String[] activityTitles;
    // flag to load home fragment when user presses back key
    private boolean shouldLoadHomeFragOnBackPress = true;
   private Handler mHandler;
    @Override
   protected void onCreate (Bundle savedInstanceState) {
       super.onCreate(savedInstanceState);
       setContentView(R.layout.activity main);
       toolbar = (Toolbar) findViewById(R.id.toolbar);
       setSupportActionBar(toolbar);
       mHandler = new Handler();
       drawer = (DrawerLayout) findViewById(R.id.drawer layout);
       navigationView = (NavigationView) findViewById(R.id.nav view);
       fab = (FloatingActionButton) findViewById(R.id.fab);
       // Navigation view header
       navHeader = navigationView.getHeaderView(0);
       txtName = (TextView) navHeader.findViewById(R.id.name);
       txtWebsite = (TextView) navHeader.findViewById(R.id.website);
       imgNavHeaderBg = (ImageView)
navHeader.findViewById(R.id.img header bg);
       imgProfile = (ImageView) navHeader.findViewById(R.id.img profile);
```

```
// load toolbar titles from string resources
        activityTitles =
getResources().getStringArray(R.array.nav item activity titles);
        fab.setOnClickListener(new View.OnClickListener() {
            @Override
            public void onClick(View view) {
                Snackbar.make(view, "Replace with your own action",
Snackbar.LENGTH LONG)
                        .setAction("Action", null).show();
        });
        // load nav menu header data
        loadNavHeader();
        // initializing navigation menu
        setUpNavigationView();
        if (savedInstanceState == null) {
            navItemIndex = 0;
            CURRENT TAG = TAG HOME;
            loadHomeFragment();
    }
    /***
     * Load navigation menu header information
     * like background image, profile image
     * name, website, notifications action view (dot)
     */
   private void loadNavHeader() {
        // name, website
        txtName.setText("Rakibul Hasan");
        txtWebsite.setText("www.coderbd.com");
        // loading header background image
        Glide.with(this).load(urlNavHeaderBg)
                .crossFade()
                .diskCacheStrategy(DiskCacheStrategy.ALL)
                .into(imgNavHeaderBg);
        // Loading profile image
        Glide.with(this).load(urlProfileImg)
                .crossFade()
                .thumbnail(0.5f)
                .bitmapTransform(new CircleTransform(this))
                .diskCacheStrategy(DiskCacheStrategy.ALL)
                .into(imgProfile);
        // showing dot next to notifications label
        navigationView.getMenu().getItem(3).setActionView(R.layout.menu dot);
    /***
```

```
* Returns respected fragment that user
     * selected from navigation menu
   private void loadHomeFragment() {
        // selecting appropriate nav menu item
        selectNavMenu();
        // set toolbar title
        setToolbarTitle();
        // if user select the current navigation menu again, don't do
anything
        // just close the navigation drawer
        if (getSupportFragmentManager().findFragmentByTag(CURRENT TAG) !=
null) {
            drawer.closeDrawers();
            // show or hide the fab button
            toggleFab();
            return;
        // Sometimes, when fragment has huge data, screen seems hanging
        // when switching between navigation menus
        // So using runnable, the fragment is loaded with cross fade effect
        // This effect can be seen in GMail app
        Runnable mPendingRunnable = new Runnable() {
            @Override
            public void run() {
                // update the main content by replacing fragments
                Fragment fragment = getHomeFragment();
                FragmentTransaction fragmentTransaction =
getSupportFragmentManager().beginTransaction();
                fragmentTransaction.setCustomAnimations(android.R.anim.fade i
n,
                        android.R.anim.fade out);
                fragmentTransaction.replace(R.id.frame, fragment,
CURRENT TAG);
                fragmentTransaction.commitAllowingStateLoss();
            }
        };
        // If mPendingRunnable is not null, then add to the message queue
        if (mPendingRunnable != null) {
            mHandler.post(mPendingRunnable);
        // show or hide the fab button
        toggleFab();
        //Closing drawer on item click
        drawer.closeDrawers();
        // refresh toolbar menu
        invalidateOptionsMenu();
```

```
}
   private Fragment getHomeFragment() {
        switch (navItemIndex) {
            case 0:
                // home
                HomeFragment homeFragment = new HomeFragment();
                return homeFragment;
            case 1:
                // photos
                PhotosFragment photosFragment = new PhotosFragment();
                return photosFragment;
            case 2:
                // movies fragment
                MoviesFragment moviesFragment = new MoviesFragment();
                return moviesFragment;
            case 3:
                // notifications fragment
                NotificationsFragment notificationsFragment = new
NotificationsFragment();
                return notificationsFragment;
            case 4:
                // settings fragment
                SettingsFragment settingsFragment = new SettingsFragment();
                return settingsFragment;
            default:
                return new HomeFragment();
    }
   private void setToolbarTitle() {
        getSupportActionBar().setTitle(activityTitles[navItemIndex]);
   private void selectNavMenu() {
        navigationView.getMenu().getItem(navItemIndex).setChecked(true);
    private void setUpNavigationView() {
        //Setting Navigation View Item Selected Listener to handle the item
click of the navigation menu
        navigationView.setNavigationItemSelectedListener(new
NavigationView.OnNavigationItemSelectedListener() {
            // This method will trigger on item Click of navigation menu
            @Override
            public boolean onNavigationItemSelected(MenuItem menuItem) {
                //Check to see which item was being clicked and perform
appropriate action
                switch (menuItem.getItemId()) {
                    //Replacing the main content with ContentFragment Which
is our Inbox View;
                    case R.id.nav home:
```

```
navItemIndex = 0;
                        CURRENT TAG = TAG HOME;
                        break;
                    case R.id.nav photos:
                        navItemIndex = 1;
                        CURRENT TAG = TAG PHOTOS;
                        break;
                    case R.id.nav movies:
                        navItemIndex = 2;
                        CURRENT_TAG = TAG_MOVIES;
                        break;
                    case R.id.nav notifications:
                        navItemIndex = 3;
                        CURRENT TAG = TAG NOTIFICATIONS;
                        break;
                    case R.id.nav settings:
                        navItemIndex = 4;
                        CURRENT TAG = TAG SETTINGS;
                        break;
                    case R.id.nav about us:
                        // launch new intent instead of loading fragment
                        startActivity (new Intent (MainActivity.this,
AboutUsActivity.class));
                        drawer.closeDrawers();
                        return true;
                    case R.id.nav privacy policy:
                        // launch new intent instead of loading fragment
                        startActivity (new Intent (MainActivity.this,
PrivacyPolicyActivity.class));
                        drawer.closeDrawers();
                        return true;
                    default:
                        navItemIndex = 0;
                }
                //Checking if the item is in checked state or not, if not
make it in checked state
                if (menuItem.isChecked()) {
                    menuItem.setChecked(false);
                } else {
                    menuItem.setChecked(true);
                menuItem.setChecked(true);
                loadHomeFragment();
                return true;
        });
        ActionBarDrawerToggle actionBarDrawerToggle = new
ActionBarDrawerToggle(this, drawer, toolbar, R.string.openDrawer,
R.string.closeDrawer) {
```

```
@Override
            public void onDrawerClosed(View drawerView) {
                // Code here will be triggered once the drawer closes as we
dont want anything to happen so we leave this blank
                super.onDrawerClosed(drawerView);
            @Override
            public void onDrawerOpened(View drawerView) {
                // Code here will be triggered once the drawer open as we
dont want anything to happen so we leave this blank
                super.onDrawerOpened(drawerView);
        };
        //Setting the actionbarToggle to drawer layout
        drawer.setDrawerListener(actionBarDrawerToggle);
        //calling sync state is necessary or else your hamburger icon wont
show up
        actionBarDrawerToggle.syncState();
    }
    @Override
    public void onBackPressed() {
        if (drawer.isDrawerOpen(GravityCompat.START)) {
            drawer.closeDrawers();
            return;
        }
        // This code loads home fragment when back key is pressed
        // when user is in other fragment than home
        if (shouldLoadHomeFragOnBackPress) {
            // checking if user is on other navigation menu
            // rather than home
            if (navItemIndex != 0) {
                navItemIndex = 0;
                CURRENT TAG = TAG HOME;
                loadHomeFragment();
                return;
        super.onBackPressed();
    }
    @Override
   public boolean onCreateOptionsMenu (Menu menu) {
        // Inflate the menu; this adds items to the action bar if it is
present.
        // show menu only when home fragment is selected
        if (navItemIndex == 0) {
            getMenuInflater().inflate(R.menu.main, menu);
```

```
// when fragment is notifications, load the menu created for
notifications
        if (navItemIndex == 3) {
            getMenuInflater().inflate(R.menu.notifications, menu);
        return true;
    }
    @Override
    public boolean onOptionsItemSelected(MenuItem item) {
        // Handle action bar item clicks here. The action bar will
        // automatically handle clicks on the Home/Up button, so long
        // as you specify a parent activity in AndroidManifest.xml.
        int id = item.getItemId();
        //noinspection SimplifiableIfStatement
        if (id == R.id.action logout) {
            Toast.makeText(getApplicationContext(), "Logout user!",
Toast.LENGTH LONG).show();
            return true;
        }
        // user is in notifications fragment
        // and selected 'Mark all as Read'
        if (id == R.id.action mark all read) {
           Toast.makeText(getApplicationContext(), "All notifications marked
as read!", Toast.LENGTH LONG).show();
        }
        // user is in notifications fragment
        // and selected 'Clear All'
        if (id == R.id.action clear notifications) {
            Toast.makeText(getApplicationContext(), "Clear all
notifications!", Toast.LENGTH LONG).show();
        }
        return super.onOptionsItemSelected(item);
    // show or hide the fab
    private void toggleFab() {
        if (navItemIndex == 0)
            fab.show();
       else
            fab.hide();
```

The End