



Mobile Channel Tabs Menu Morphing Transition

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We have a custom launching/dismissing animation for the new menu which launches from tapping the nav bar header.

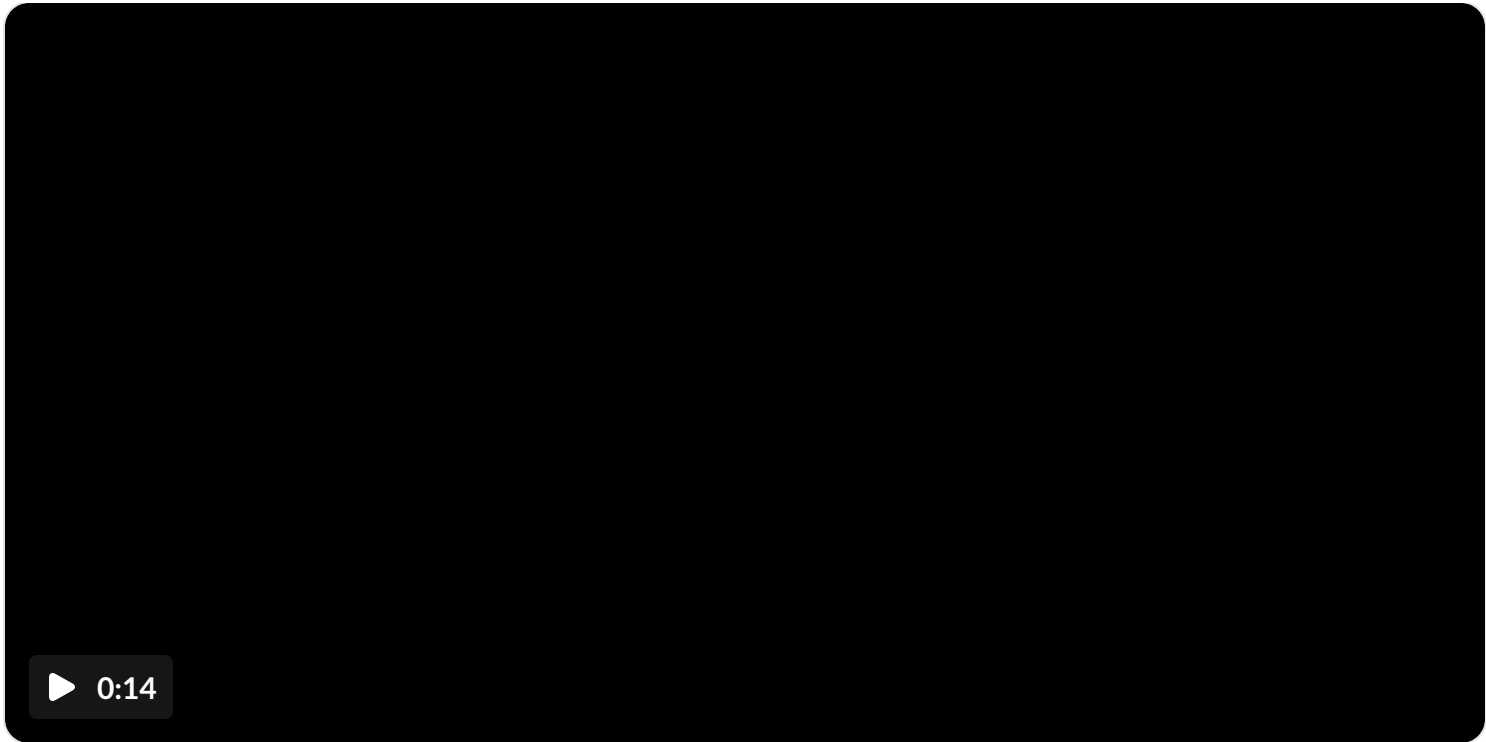
In this doc, we talk about presenting the view specifically. Dismissing is essentially the same but opposite.

Overall, the premise of the transition works by adding a view on top of the current view and making it look exactly the same as the existing nav bar. Then, we manipulate the view to get to the final state.

1. Container View

The container view is the solid-colored view that all the content is laid on. It starts at the same size, position, background color, and corner radius as the title view that exists in the collapsed state. Then, during the animation, all those properties like size, position, background color, and corner radius change to ones of the container view in the final state.

Moreover, the background scrim and shadow on the container is also animated in.



2. Title View

This is the one view that's a **shared** element and is the view that is always visible in the collapsed state and also gets added in the expanded state. When the transition starts, the title view gets added at the same size and position as the view in the collapsed state. This gives it the illusion that nothing got added on top at all. Then, during the transition, the title view moves to its new position within the container view. On top of that, it updates its views to change for the expanded state.

Left ornament: In collapsed state, this is either member avatar or some sort of icon like #, , or the selected tab icon. In the collapsed state, it updates to an X (could be nothing for android if we decide no X). To transition between the different ornaments, we scale the old one to 0.5 and change its alpha to 0. We do the opposite for the new one so it appears from that to scale 1 and alpha 1. Moreover, if the ornament occupies a different width, we also animate its containers width so that the title and subtitle view move smoothly to account for the ornament.

Badge: There is a badge if there is an unread. It only appears in the collapsed state. We toggle its appearance/disappearance with a standard scale and alpha animation.

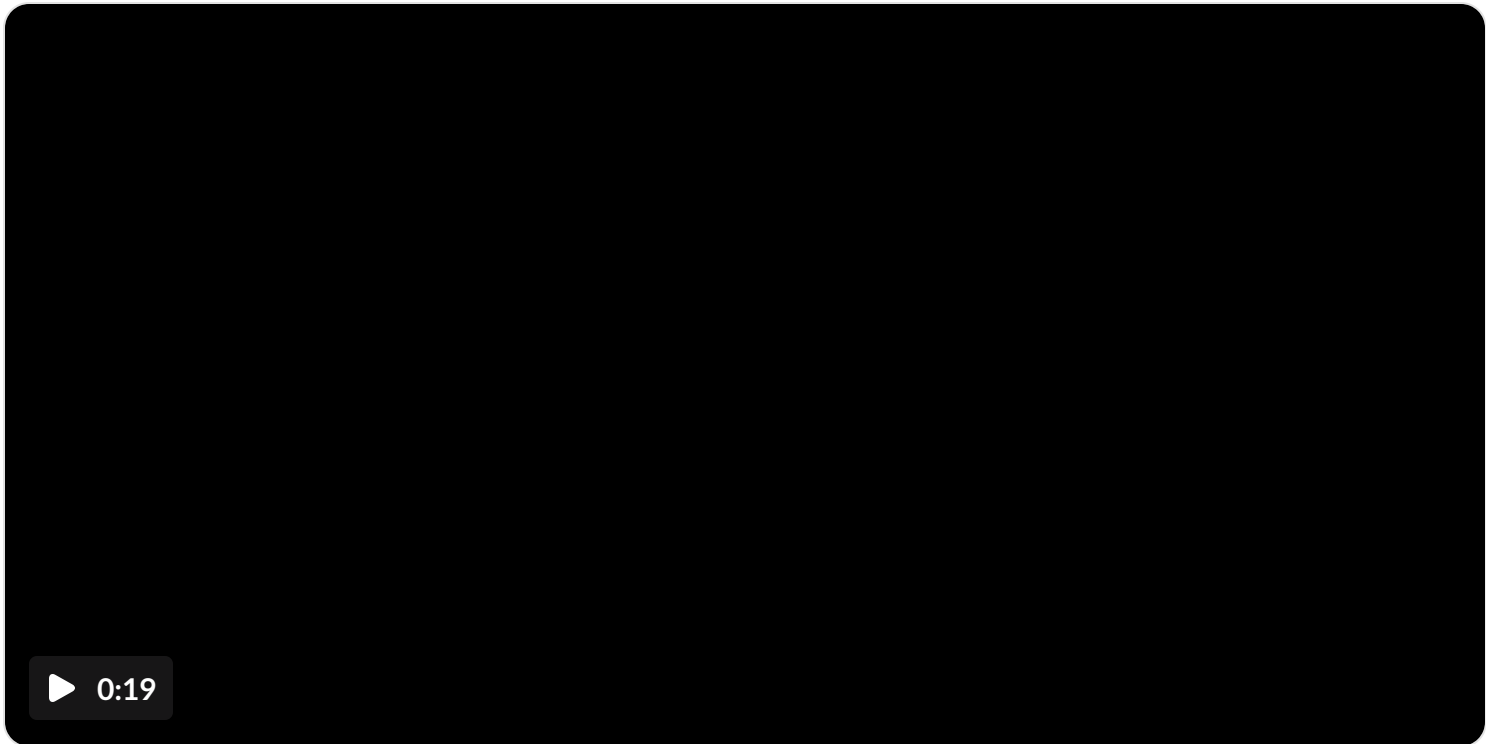
Channel Prefix: Icon that appears in front of title. We animate its alpha and position so the title text moves to the left and right smoothly when the prefix appears/disappears.

Subtitle Caret: Caret icon that exists in the collapsed state. Appears and disappears with scale and alpha.



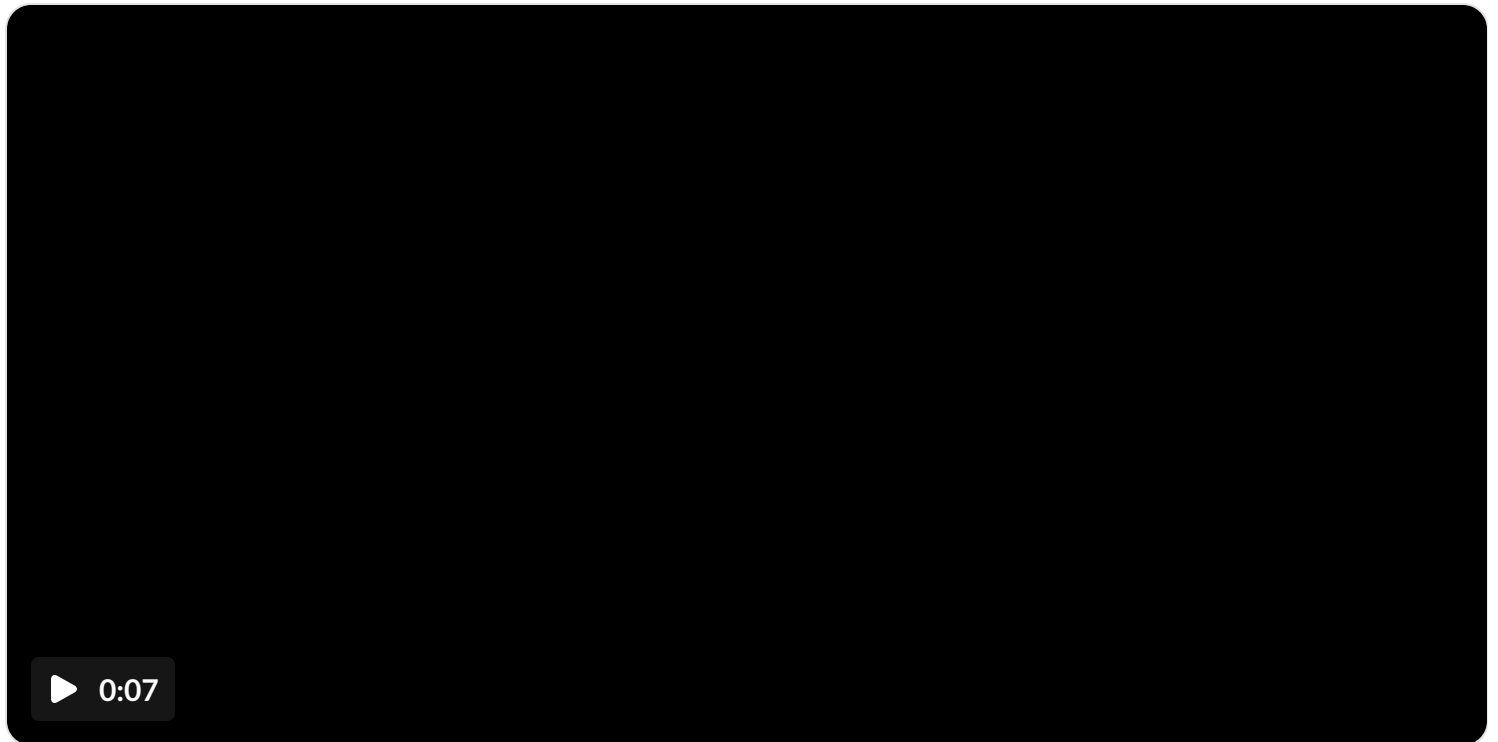
3. List View

The list view essentially gets revealed as we go from collapsed → expanded. It has slight movement to the left during the expansion because its pinned to the left of the container view but thats it.



Final Version

This is how it all comes together in normal speed. We also reveal and hide the right buttons in the expanded state with an alpha and scale.



I specifically didn't mention the specific animation parameters we use here since that's not entirely finalized. However, we used a **smooth** (overdamped spring) to animate with medium duration (perceptual duration of 250ms). Let me know if there are any further questions.