

HikeTracker App

Getting Started

2021-06-30

Why another tracking app?

Accuracy

GPS systems were designed primarily for relatively fast moving objects (automobiles, airplanes, cruise missiles, etc.) operating in the open (cities, freeways, deserts, etc.)

Because of limited accuracy of commercial GPS versions, the strategies they use are not very appropriate for very slow moving critters such as hikers slogging up a trail in rain and heavy tree cover, surrounded by microwave-blocking hills and mountains. Most are set up to record a position every second; errors that are tiny in comparison to the distance traveled by a vehicle on a highway in a second are quite large in comparison to the one meter or so traveled by a walker in that second. Worse, these errors do not tend to cancel out but rather accumulate - the more positions you save, the worse the total error.

This app uses some fairly sophisticated but efficient methods to combine and curate the points, only saving as many as are necessary to give an accurate picture of the user's track and accurate totals for distance traveled and elevation gained and lost.

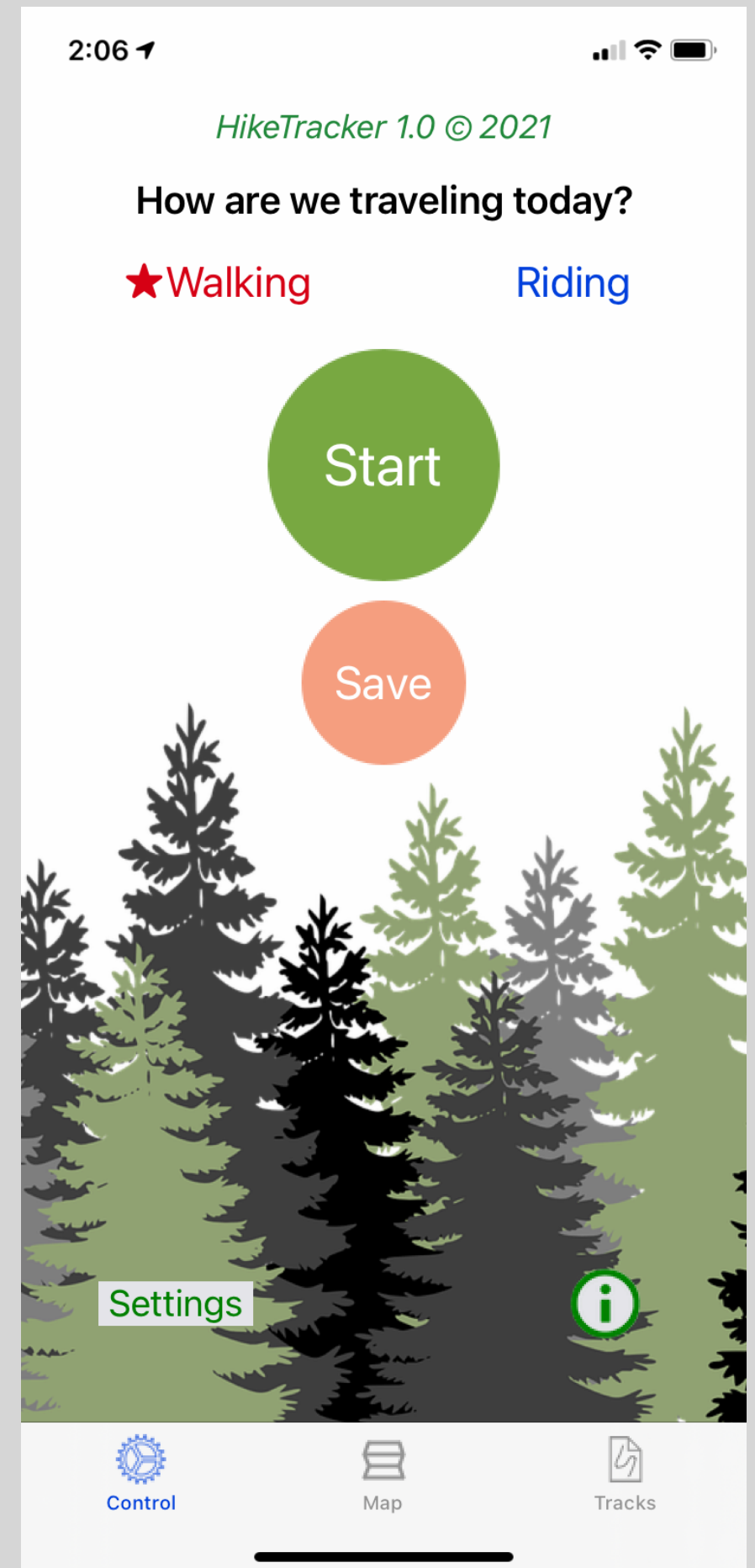
Simplicity

The app is set up to work well “out of the box” for a hiker or walker - just tap “Start” and go!

There are various settings that permit its use for other activities and special situations but those things are generally held out of sight where they won't get in the way or confuse a beginning user. It is also pretty hard to accidentally lose your tracking data - the app makes you work at it to mess things up 😊

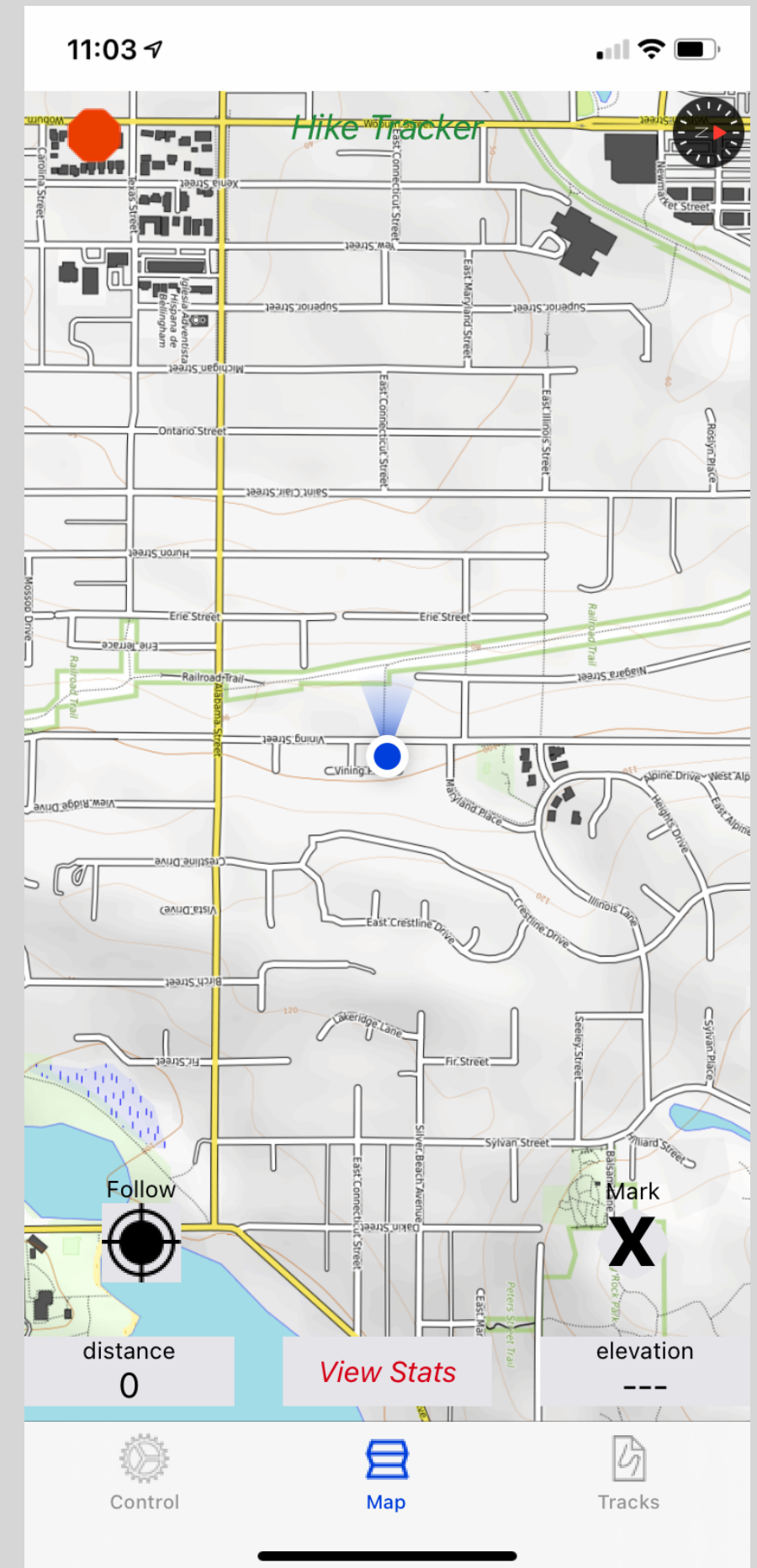
Start

- When the app starts you'll see the Control screen
- The only thing you have to choose before you start is whether you will be taking steps (walking / running) or riding a bike or other vehicle
- Tap Walking or Riding
- Tap Start to begin logging your trip
- The Info button in the lower right will display some basic information about this app and give a link to the Support Website



Logging

- There is a short delay while the GPS gets its act together, whereupon you will be taken to the Map screen and you are ready to go
- All of the gadgets on the Map screen are optional.
- So put the phone to sleep, stick it in your pocket or pack, and go!
- P.S. There are readouts of your distance traveled so far and current elevation near the lower corners - you can see other info by tapping *View Stats* - more on this later...



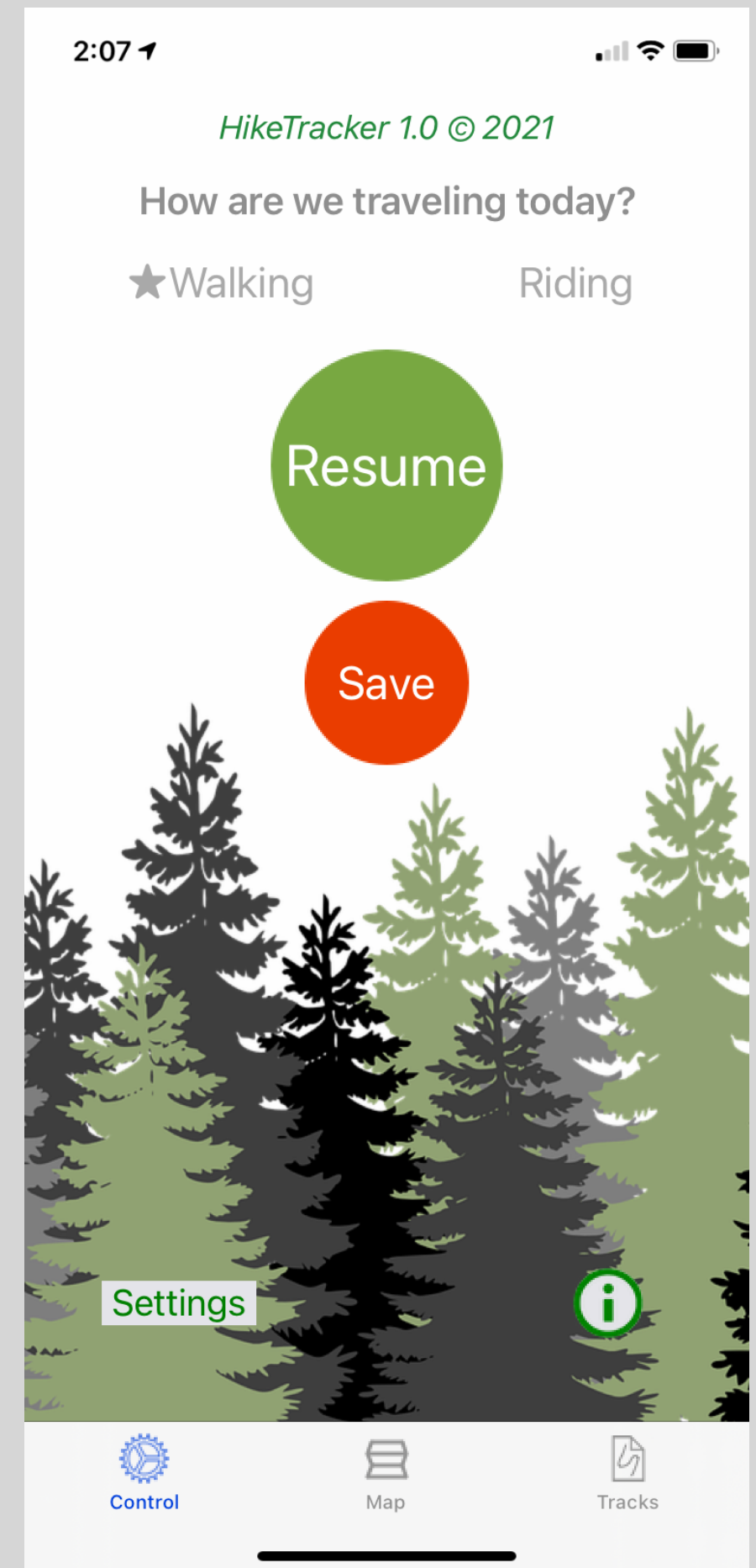
Pausing

- When you complete your trip, move back to the Control screen by tapping the Control tab in the lower left corner
- Note that the big button has changed from Start to Stop/Pause
- And at this point, tapping that big button is just about the only useful thing to do
- When you do, the Save button will become active



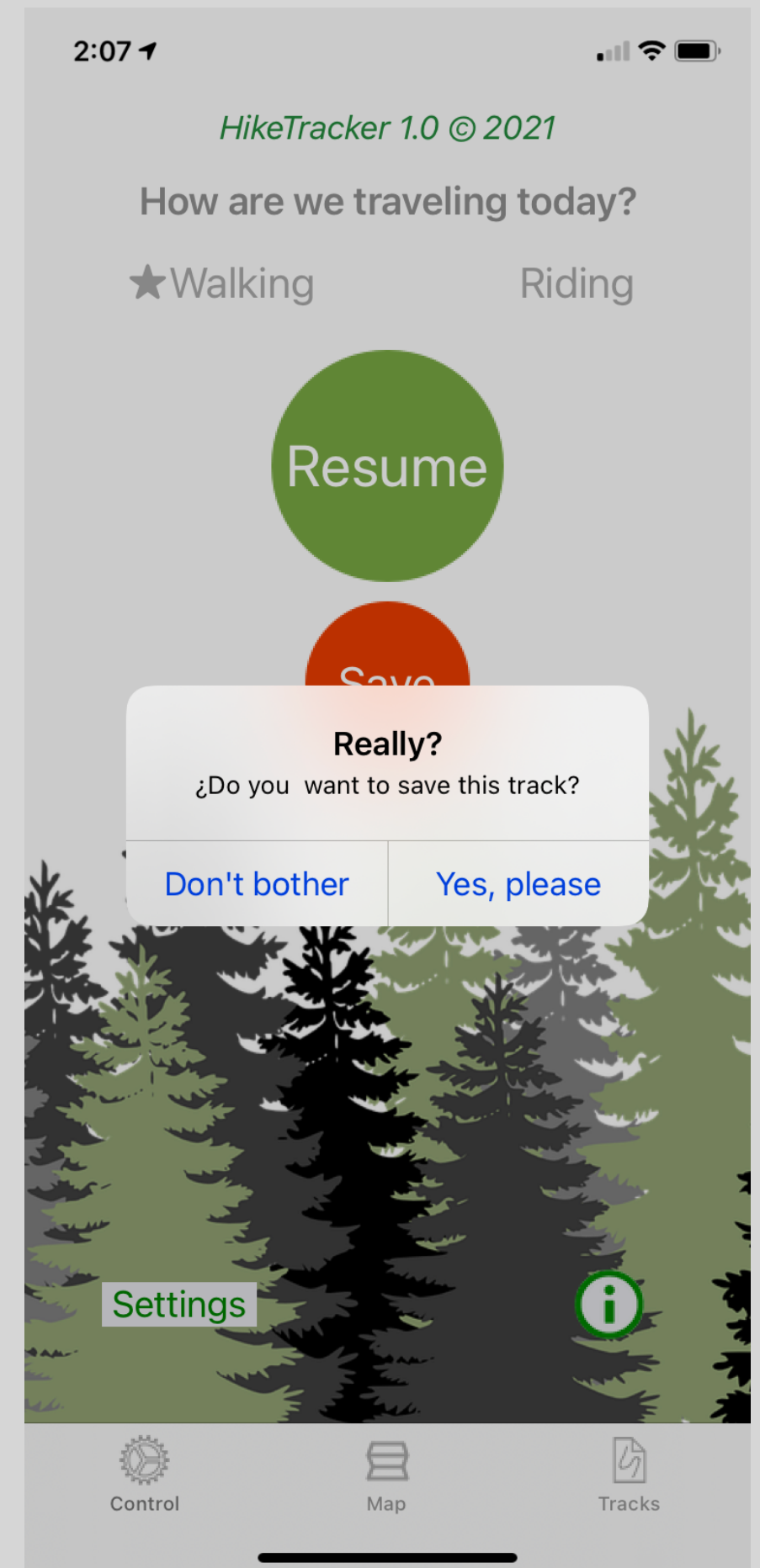
Saving

- Now there are two(2) big buttons to pick from
- Resume will restart the GPS, take you back to the map screen and continue logging your trip
- Save will start a sequence of dialogs that allow you to save securely a copy of your track as it stands at this moment.



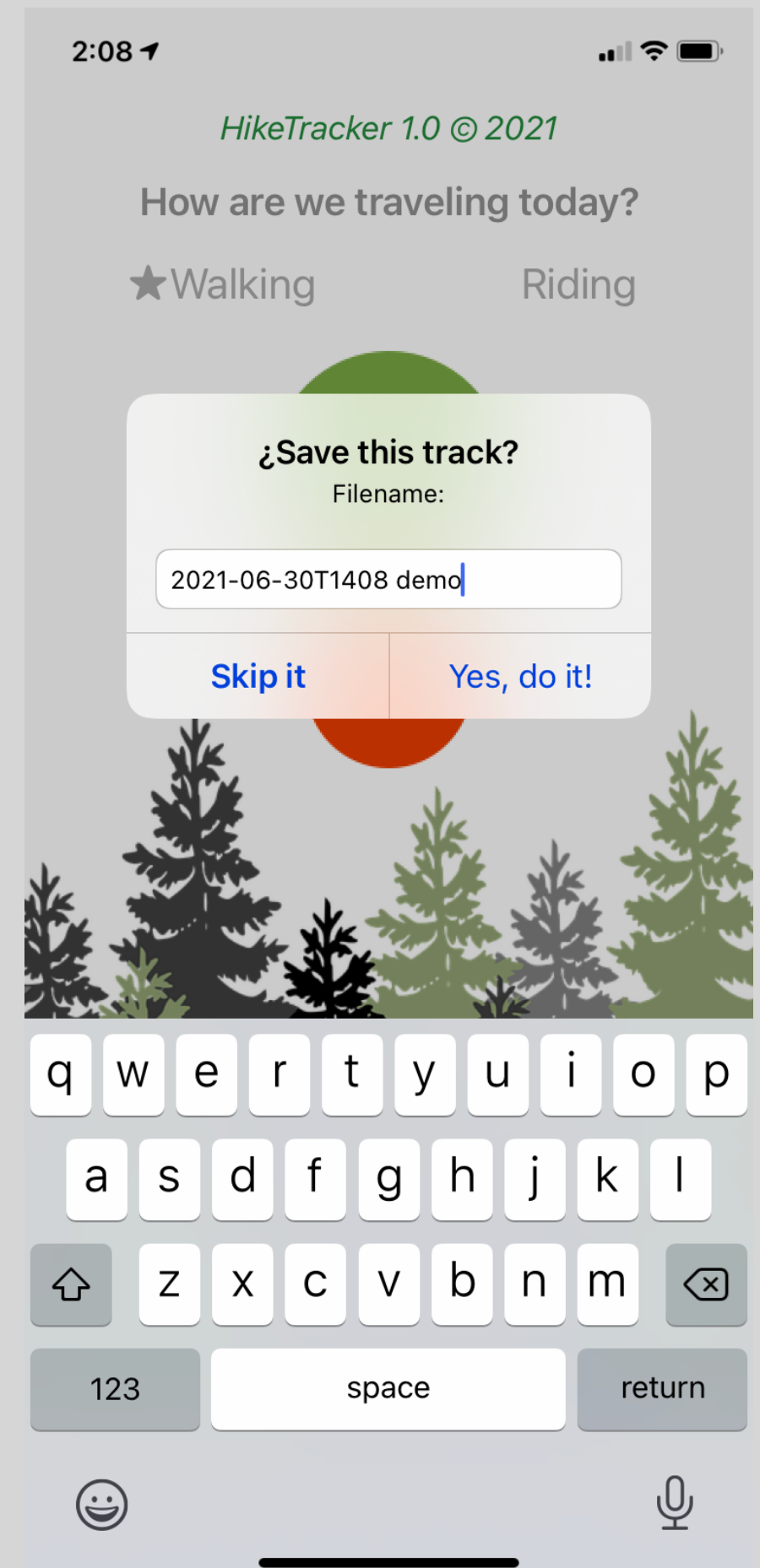
Really?

- The first screen just allows you to recover gracefully from an accidental tap on the Save button
- Next we'll name our track



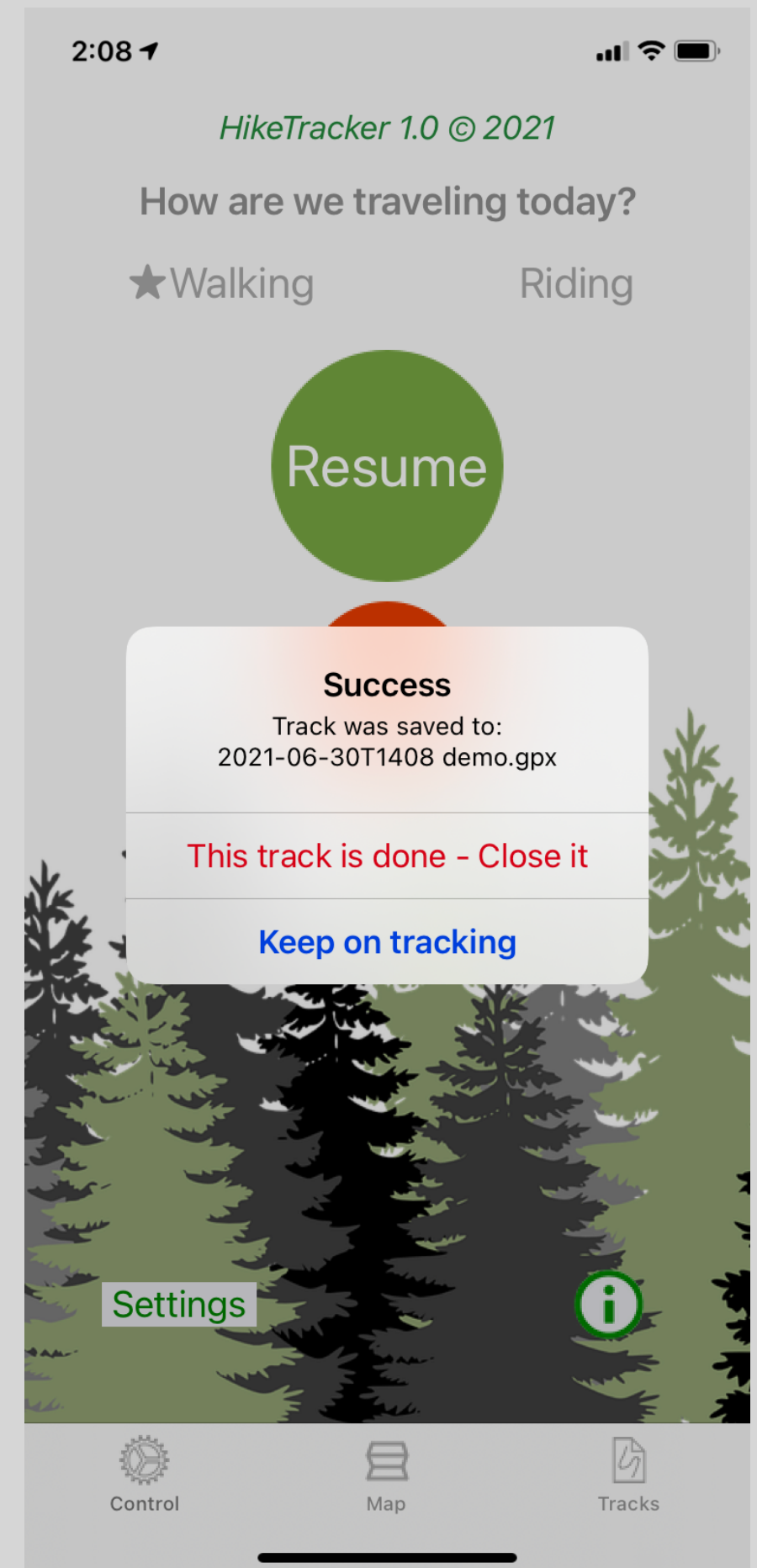
File Name

- The default file name is just the current date and time in ISO standard format, e.g., 2020-12-14T1551
- This format starts with the most significant datum (year) and trails down to the least (minutes)
- This makes alphabetical order the same as temporal order
- You can replace that default name or add to it



Saved

- If your track is not complete (say, you are stopped for lunch) you can choose to continue tracking
- Otherwise, we will go back to square one - the Start screen



**Now get outta here
and go hiking!**

P.S. Don't forget your phone

