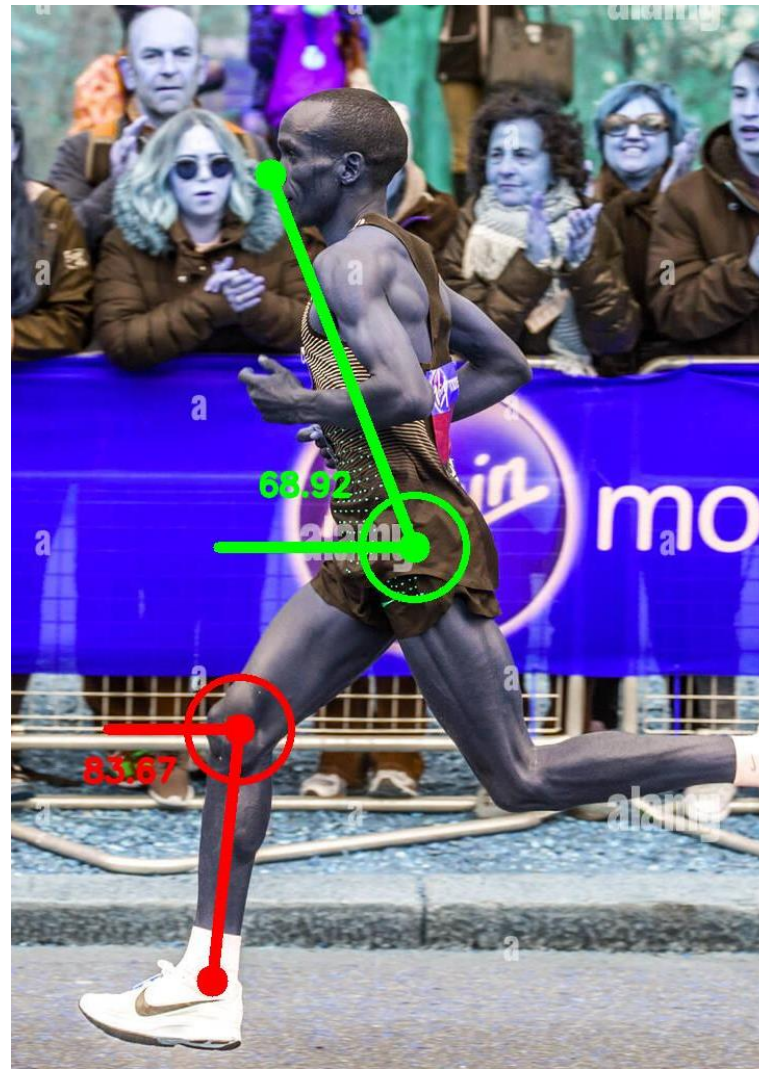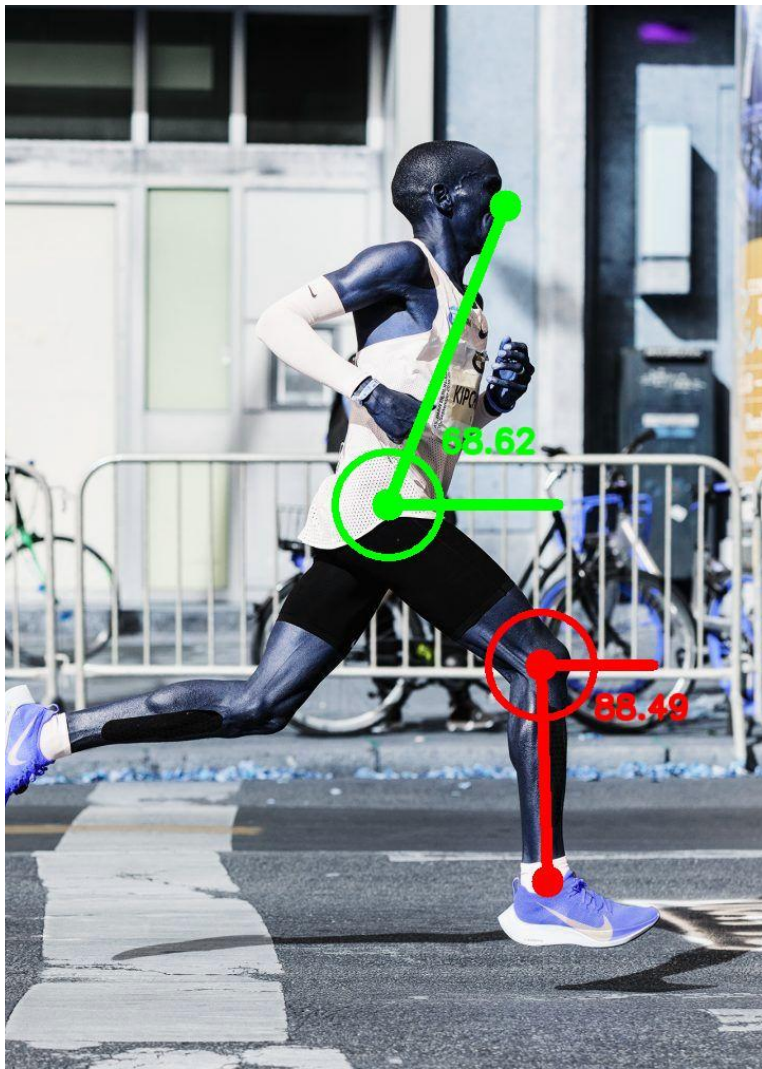# Analysis of Running Form
with Keypoint R-CNN

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Project Objectives:

This project aims to use Keypoint R-CNN, which is a human pose estimation model, to analyse running form by detecting certain important points in the human body. The running form of the current Marathon world record holder Eliud Kipchoge was analysed to obtain a baseline for comparison. The goal of this project is to create a full stack web application that casual runners can use to improve their running form. They will be able to upload side profile images of themselves running, and their running form will be compared with Eliud Kipchoge's. The website will also provide personalized advice based on the results.

Aspects of Running Form Analysed:

Overstriding: When the leading foot lands too far in front of the body

Trunk angle: There is an optimal angle of forward lean for the upper body

Web application screenshot: