

Exploring AI-Art Intersections: Pose Detection

In this exploration, I leverage a pre-trained Mediapipe model to delve into the interaction between Artificial Intelligence (AI) and artistic expression. My initial aim was to create an aesthetically pleasing message using wrist detection technology, resulting in the visual representation of the phrase "I <3 U." Despite attempts to conceal my wrist and maximize spatial utilization, the model's persistent detection capabilities underscored the complexity of AI's perceptual accuracy, prompting deeper reflections on its potential implications for creative endeavors.



Discussion:



My experimentation with pose detection technology I believe is basic and straightforward, but it is an application for conveying endearing messages to friends. I believe if more exploited it can be tailored for recipients with an affinity for technology-infused sentiments, revealing an interplay between emotional intimacy and technological innovation.

Python

```
import mediapipe as mp
import cv2
import numpy as np
```

```

mp_pose = mp.solutions.pose
pose = mp_pose.Pose()

#please feel free to modify the path to the path of the video i put with my
code, or your own video
cap = cv2.VideoCapture('/Users/landy/Downloads/tia1.mp4')

#modified chatgpt, asked how to display a video
canvas = np.zeros((480, 640, 3), np.uint8)

while cap.isOpened():
    ret, frame = cap.read()
    if not ret:
        break

    frame_rgb = cv2.cvtColor(frame, cv2.COLOR_BGR2RGB)

    results = pose.process(frame_rgb)

    if results.pose_landmarks:
        mp.solutions.drawing_utils.draw_landmarks(frame, results.pose_landmarks,
        mp_pose.POSE_CONNECTIONS)

    right_wrist = results.pose_landmarks.landmark[mp_pose.PoseLandmark.RIGHT_WRIST]
    if right_wrist.visibility > 0.5:
        x = int(right_wrist.x * canvas.shape[1])
        y = int(right_wrist.y * canvas.shape[0])
        cv2.circle(canvas, (x, y), 10, (255, 0, 0), -1)

    cv2.imshow('Video', frame)

    cv2.imshow('Animation', canvas)

    if cv2.waitKey(1) & 0xFF == ord('q'):

```

```
break  
  
cap.release()  
cv2.destroyAllWindows()
```

On a more serious note about pose detection, the broader implications of AI-enabled pose detection emerged, notably in the realms of threat assessment and surveillance. While acknowledging the practical benefits of AI in ensuring security and safety, the ethical dilemmas pertaining to data acquisition and privacy infringement cast a critical light on the need for stringent ethical guidelines in AI implementation.