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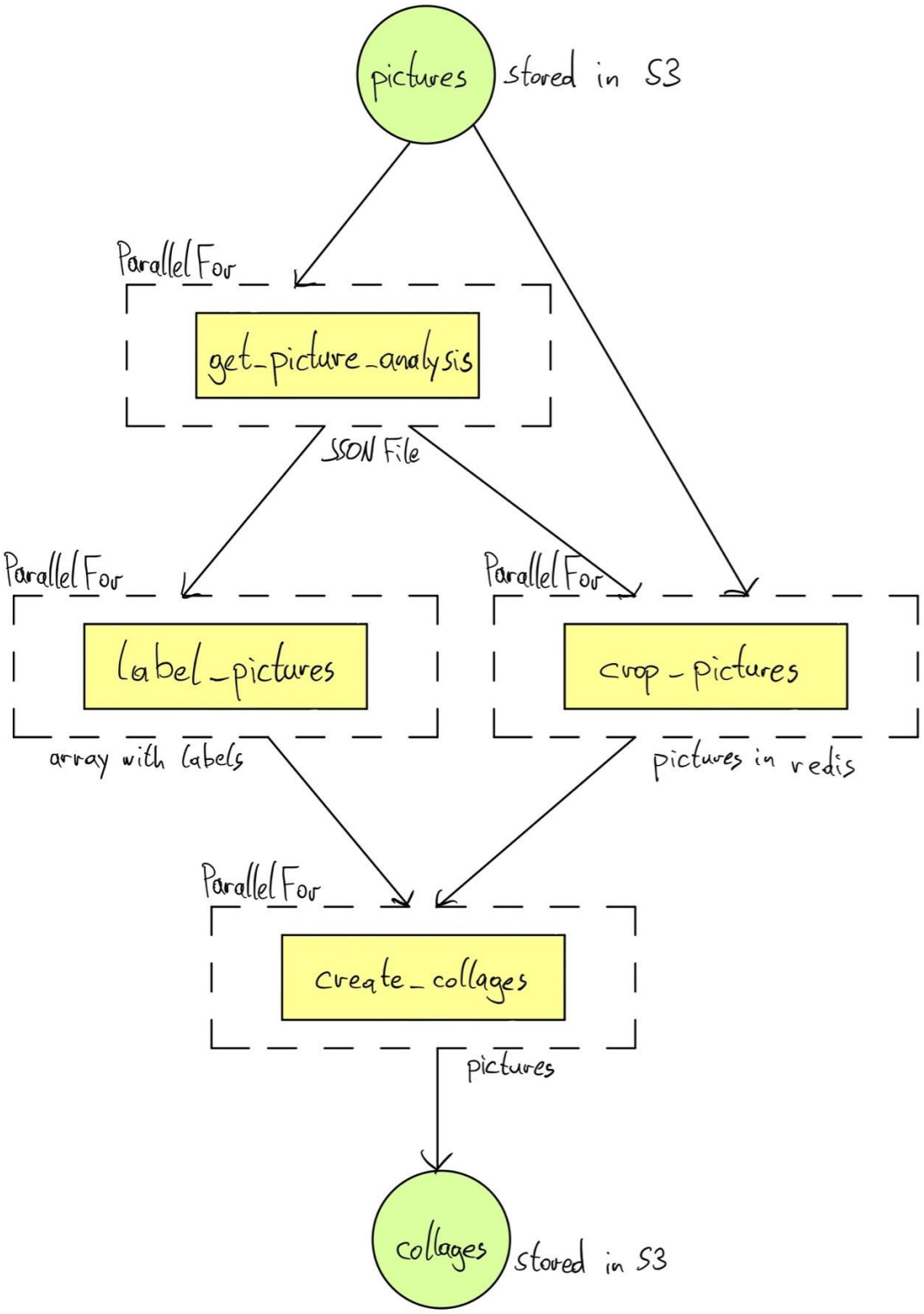

Name	Description
pictures	We start off with pictures that are given to the workflow via S3. These work as our input for two different functions.
get_picture_analysis	**Input: pictures from S3 - Output: JSON File** This function uses the Amazon Rekognition service to analyze the pictures to create a JSON Files with all of the needed data. The function needs to take the pictures from S3, connect to the Rekognition service and then analyze them in parallel. This can be parallelized, since the analysis is independent for each picture. The output is also needed for two different functions.
label_pictures	**Input: JSON Files - Output: array with label information** This function goes through the JSON Files and extracts the necessary information from each of them. The confidence level for each emotion has to be above a certain threshold to be accepted in this function. The labeling should then be very clear as to be used for the next function. (For example: Picture 1 - Face 1 - Happy, Picture 1 - Face 2 - Sad, Picture 2 - Face 1 - Surprised,...) This can also be parallelized since the data is independent from each other.
crop_pictures	**Input: pictures from S3 & JSON Files -** **Output: cropped pictures in redis** This function goes through each picture together with its JSON File to determine the bounding box and crop the picture accordingly. This can also be done in parallel since the pictures and JSON Files can be used in any order, as long as the order is restored at the end. The pictures are then stored in redis (since this is the faster option) for further usage.
create_collages	**Input: array with label information & cropped pictures in redis** **Output: collage pictures in S3** This function takes the array with the information for how the faces are labeled, together with the cropped pictures and combines them into multiple collages. This function can also be parallelized in the sense that each emotion should get one process that goes through the pictures and chooses the correct ones. The collages are afterwards stored in S3 as for the task to be fulfilled.