


predict boundaries



This diagram illustrates the first step of a cell segmentation pipeline. It begins with a grayscale micrograph of cells. An arrow labeled "predict boundaries" points to a second image where the boundaries of the cells are highlighted with thick black lines. The interior of the cells is mostly white, with some gray shading indicating texture or intensity variations.

watershed



This diagram illustrates the second step of the cell segmentation pipeline. An arrow labeled "watershed" points from the boundary-predicted image to a third image. This image shows the result of watershed segmentation, where the interior of each cell is filled with a unique color. The colors include blue, green, yellow, red, and purple, creating a multi-colored map of the cells.

agglomeration



This diagram illustrates the third step of the cell segmentation pipeline. An arrow labeled "agglomeration" points from the watershed-segmented image to a final image. In this final image, some of the colored regions from the previous step have been merged together. For example, a large blue region and a large green region have been combined into a single magenta-colored region, while other smaller regions remain distinct.