CLAIMS

1. A method comprising:

preparing a blood sample for analysis by:

depositing the blood sample within a sample chamber; and

placing the sample chamber, with the blood sample deposited therein, within a microscopy unit;

acquiring one or more microscopic images of the sample chamber with the blood sample deposited therein, using a microscope of the microscopy unit;

based upon the one or more images, determining an amount of one or more cell types within the sample chamber that had already settled within the sample chamber, prior to acquisition of the one or more microscopic images; and

determining a characteristic of the sample, at least partially in response thereto.

2. The method according to claim 1, wherein preparing the blood sample for analysis further comprises staining the blood sample with one or more stains.

3. The method according to claim 1, wherein:

determining an amount of one or more cell types within the sample chamber that had already settled within the sample chamber, prior to acquisition of the one or more microscopic images comprises determining whether more than a threshold amount of red blood cells within the sample chamber had already settled within the sample chamber, prior to acquisition of the one or more microscopic images, and

determining the characteristic of the sample comprises, in response to determining that more than the threshold amount of red blood cells within the sample chamber had already settled within the sample chamber prior to acquisition of the one or more microscopic images, invalidating the at least a portion of the sample from being used for performing at least some measurements upon the sample.

4. The method according to claim 1, further comprising:

subsequent to placing the sample chamber, with the blood sample deposited therein, within the microscopy unit, allowing the one or more cell types within the sample chamber to form a monolayer of cells;

acquiring a set of one or more additional microscopic images of the monolayer of cells; and

performing one or more measurements upon the sample, by analyzing the set of one or more additional microscopic images.

5. The method according to claim 1, further comprising determining an indication of how long the blood sample has been in the sample chamber prior to acquisition of the one or more microscopic images, based upon the amount of the one or more cell types that had already settled within the sample chamber, prior to acquisition of the one or more microscopic images.

6. The method according to any one of claims 1-5,

further comprising performing one or more measurements upon the sample,

wherein determining the amount of the one or more cell types within the sample chamber that had already settled within the sample chamber, prior to acquisition of the one or more microscopic images comprises determining whether more than a threshold amount of red blood cells within the sample chamber had already settled within the sample chamber, prior to acquisition of the one or more microscopic images, and

wherein performing one or more measurements upon the sample comprises, in response to determining that more than the threshold amount of red blood cells within the sample chamber had already settled within the sample chamber, prior to acquisition of the one or more microscopic images, calibrating the measurements.

7. The method according to claim 6, wherein preparing the blood sample for analysis further comprises staining the blood sample with one or more stains, wherein calibrating the measurements comprises calibrating the measurements to account for an amount of staining that entities within the blood sample underwent as indicated by more than the threshold amount of red blood cells within the sample chamber having already settled within the sample chamber, prior to acquisition of the one or more microscopic images.