

CLAIMS**WHAT IS CLAIMED IS:**

1. A method of processing one or more images, the method comprising:
determining one or more current exposure settings for a current image of a current scene at a current time;
determining one or more motion characteristics associated with an image sensor;
predicting, based on the one or more motion characteristics, a location of a portion of the current image to use for determining one or more future exposure settings for the image sensor, the one or more future exposure settings for capturing a future image of a future scene at a future time, the future time being subsequent to the current time; and
determining the one or more future exposure settings based on the predicted portion of the current image.
2. The method of claim 1, further comprising:
determining the one or more future exposure settings before a field of view of the image sensor reaches the future scene.
3. The method of claim 1, wherein predicting the location of the portion of the current image to use for determining the one or more future exposure settings comprises excluding a region of the current image from being used for determining the one or more future exposure settings.
4. The method of claim 1, wherein the one or more motion characteristics comprise one or more of a speed or a direction of travel of the image sensor.
5. The method of claim 4, further comprising:
determining the one or more motion characteristics based at least in part on one or more of an inertial sensor or input to a steering system in communication with the image sensor.
6. The method of claim 4, further comprising:

determining the one or more motion characteristics based at least in part on one or more regions of interest of the current image.

7. The method of claim 1, wherein determining the one or more future exposure settings based on the predicted portion of the current image comprises:

predicting one or more regions of interest of the future image in the predicted portion; and

adjusting exposure settings for the one or more regions of interest.

8. The method of claim 1, further comprising:

determining a grid comprising one or more grid elements associated with one or more regions of the future image in the predicted portion; and

determining weights for the one or more grid elements, wherein the one or more future exposure settings are based on the weights.

9. The method of claim 1, wherein the one or more future exposure settings include a variation in one or more current exposure settings of the current image.

10. The method of claim 1, further comprising:

capturing the future image by the image sensor, based on the one or more future exposure settings.

11. An apparatus for processing one or more images, the apparatus comprising:

a memory configured to store the one or more images; and

a processor implemented in circuitry and configured to:

determine one or more current exposure settings for a current image of a current scene at a current time;

determine one or more motion characteristics associated with an image sensor;

predict, based on the one or more motion characteristics, a location of a portion of the current image to use for determining one or more future exposure settings for the image sensor, the one or more future exposure

settings for capturing a future image of a future scene at a future time, the future time being subsequent to the current time; and

determine the one or more future exposure settings based on the predicted portion of the current image.

12. The apparatus of claim 11, wherein the processor is further configured to:
determine the one or more future exposure settings before a field of view of the image sensor reaches the future scene.
13. The apparatus of claim 11, wherein predicting the location of the portion of the current image to use for determining the one or more future exposure settings comprises excluding a region of the current image from being used for determining the one or more future exposure settings.
14. The apparatus of claim 11, wherein the one or more motion characteristics comprise one or more of a speed or a direction of travel of the image sensor.
15. The apparatus of claim 11, wherein the processor is further configured to:
determine the one or more motion characteristics based at least in part on one or more of an inertial sensor or input to a steering system in communication with the image sensor.
16. The apparatus of claim 11, wherein the processor is further configured to:
determine the one or more motion characteristics based at least in part on one or more regions of interest of the current image.
17. The apparatus of claim 11, wherein determining the one or more future exposure settings based on the predicted portion of the current image comprises:
predicting one or more regions of interest of the future image in the predicted portion; and
adjusting exposure settings for the one or more regions of interest.

18. The apparatus of claim 11, wherein the processor is further configured to:
determine a grid comprising one or more grid elements associated with one or more regions of the future image in the predicted portion; and
determine weights for the one or more grid elements, wherein the one or more future exposure settings are based on the weights.
19. The apparatus of claim 11, wherein the one or more future exposure settings include a variation in one or more current exposure settings of the current image.
20. The apparatus of claim 11, wherein the processor is further configured to:
capture the future image by the image sensor, based on the one or more future exposure settings.
21. The apparatus of claim 11, further comprising a camera for capturing one or more images.
22. The apparatus of claim 11, wherein the apparatus comprises a mobile device with a camera for capturing one or more images.
23. The apparatus of claim 11, further comprising a display for displaying one or more images.
24. A non-transitory computer-readable medium having stored thereon instructions that, when executed by one or more processors, cause the one or more processors to:
determine one or more current exposure settings for a current image of a current scene at a current time;
determine one or more motion characteristics associated with an image sensor;
predict, based on the one or more motion characteristics, a location of a portion of the current image to use for determining one or more future exposure settings for the image sensor, the one or more future exposure settings for capturing a future image of a future scene at a future time, the future time being subsequent to the current time; and
determine the one or more future exposure settings based on the predicted portion of the current image.

25. The non-transitory computer-readable medium of claim 24, further comprising instructions that, when executed by the one or more processors, cause the one or more processor to:

determine the one or more future exposure settings before a field of view of the image sensor reaches the future scene.

26. The non-transitory computer-readable medium of claim 24, wherein predicting the location of the portion of the current image to use for determining the one or more future exposure settings comprises excluding a region of the current image from being used for determining the one or more future exposure settings.

27. The non-transitory computer-readable medium of claim 24, further comprising instructions that, when executed by the one or more processors, cause the one or more processor to:

determine the one or more motion characteristics based at least in part on one or more of an inertial sensor or input to a steering system in communication with the image sensor.

28. The non-transitory computer-readable medium of claim 24, further comprising instructions that, when executed by the one or more processors, cause the one or more processor to:

determine the one or more motion characteristics based at least in part on input to a steering system in communication with the image sensor.

29. An apparatus for processing one or more images, the apparatus comprising:
means for determining one or more current exposure settings for a current image of a current scene at a current time;

means for determining one or more motion characteristics associated with an image sensor;

means for predicting, based on the one or more motion characteristics, a location of a portion of the current image to use for determining one or more future exposure settings for the image sensor, the one or more future exposure settings for capturing a

future image of a future scene at a future time, the future time being subsequent to the current time; and

means for determining the one or more future exposure settings based on the predicted portion of the current image.

30. The apparatus of claim 29, wherein predicting the location of the portion of the current image to use for determining the one or more future exposure settings comprises excluding a region of the current image from being used for determining the one or more future exposure settings.