CLAIMS

1. Device for acquiring images of an individual aboard a vehicle, the device comprising:
   - a frame suited to being fixed to ground,
   - a support mounted with respect to the frame, the support comprising a first camera, a second camera, an infrared camera, a first infrared illumination source and a second infrared illumination source,
   - the first camera configured to acquire a first image showing the individual aboard the vehicle,
   - the second camera configured to acquire a second image showing the individual aboard the vehicle,
   - a processing unit configured to determine data indicative of a position of an iris of the individual from the first image and the second image,
   - the infrared camera configured to be oriented towards the iris of the individual by means of the data, and then to acquire a third image and a fourth image while the infrared camera is oriented towards the iris,
   - the first infrared illumination source configured to illuminate the iris during acquisition of the third image, and
   - the second infrared illumination source configured to illuminate the iris during acquisition of the fourth image, the second infrared illumination source being separate from the first infrared illumination source.

2. Device according to the preceding claim, wherein:
   - the first camera, the second camera and the infrared camera have respective optical inputs,
   - the first infrared illumination source has a first optical output,
   - the second infrared illumination source has a second optical output,
   - the first optical output and the optical inputs together bound a first working area (A+B) visible in a front view of the device, the first working area (A+B) having, in the front view:
     - a first dimension measured in a first direction, and
     - a second dimension measured in a second direction perpendicular to the first direction,

- the second optical output and the optical inputs together bound a second working area (A+C) visible in the front view, the second working area (A+C) having, in the front view:
  - a first dimension measured in the first direction, and
  - a second dimension measured in the second direction,
- wherein the first dimension of the second area (A+C) is greater than the first dimension of the first area (A+B) and/or the second dimension of the second area (A+C) is smaller than the second dimension of the first area (A+B).

3. Device according to the preceding claim, wherein:

- the first dimension of the first area (A+B) is between 200 and 250 millimetres, and/or
- the second dimension of the first area (A+B) is between 250 and 260 millimetres, and/or
- the first dimension of the second area (A+C) is between 250 and 320 millimetres, and/or
- the second dimension of the second area (A+C) is between 120 and 130 millimetres.

4. Device according to either one of Claims 2 and 3, wherein:

- the optical inputs are included in an acquisition area (A),
- the first optical output is included in a first infrared illumination area (B) separated from the acquisition area (A) by a first line parallel to the first direction, the first working area (A+B) being the union of the acquisition area (A) and the first infrared illumination area (B),
- the second optical output is included in a second infrared illumination area (C) separated from the acquisition area (A) by a second line parallel to the second direction, the second working area (A+C) being the union of the acquisition area (A) and the second infrared illumination area (C).

5. Device according to any one of Claims 2 to 4, wherein the second direction is vertical with respect to the ground.

6. Device according to any one of the preceding claims, wherein:

- the first infrared illumination source has a first optical output spaced at least 13 centimetres from an optical input of the infrared camera, and/or
- the second infrared illumination source has a second optical output spaced at least 13 centimetres from the optical input of the infrared camera.

7. Device according to any one of the preceding claims, wherein the first camera and the second camera have respective optical inputs that are separated by a distance of at least 20 centimetres.

8. Device according to any one of the preceding claims, wherein the first camera and the second camera have respective optical inputs having optical axes that are secant or that intersect.

9. Device according to any one of the preceding claims, further comprising:

- an illumination source in the visible range configured to illuminate the individual during acquisition of the first image or acquisition of the second image,
- wherein the first camera and the second camera are sensitive to wavelengths emitted by the illumination source in the visible range.

10. Device according to any one of the preceding claims, wherein the infrared camera is configured to acquire a succession of images comprising at least three images while the infrared camera is oriented towards the iris, and the first illumination source and the second illumination source are configured to alternately illuminate the iris during acquisition of the succession of images.

11. Device according to any one of Claims 1 to 9, wherein:

- the processing unit is configured to detect whether or not the iris is visible in the third image,
- the infrared camera is configured to acquire the fourth image provided that the processing unit has detected that the iris is visible in the third image.

12. Device according to any one of the preceding claims, wherein:

- the support is mounted so that it can move in vertical translation with respect to the frame and/or rotatably about a vertical axis with respect to the frame.

13. Device according to any of the preceding claims, wherein the processing unit is moreover configured to:

- detect the vehicle in an image,
- determine a position of the support suitable for showing a face of an individual aboard the vehicle,
- move the support with respect to the frame towards the position.

14. System comprising two devices for acquiring images of an individual aboard a vehicle, each of the two devices being according to any one of the preceding claims, the two devices being situated on either side of a passage for the vehicle.

15. Method for acquiring images of an individual aboard a vehicle, the method comprising the following steps:

- acquiring a first image showing the individual aboard the vehicle, by means of a first camera,
- acquiring a second image showing the individual aboard the vehicle, by means of a second camera,
- determining data indicative of a position of an iris of the individual from the first image and the second image,
- orienting an infrared camera towards the iris of the individual by means of the data, and then acquiring a third image and a fourth image showing the iris, by means of the infrared camera oriented towards the iris,
- illuminating the iris during acquisition of the third image, by means of a first infrared illumination source,
- illuminating the iris during acquisition of the fourth image, by means of a second infrared illumination source separate from the first infrared illumination source.