(X) R1 ( ) R2 ( ) R3 ( ) PG0 ( ) PG1 ( ) Estagiário ( ) Tecnólogo ( ) PIBIC Last Name - Costa First Name - Elaine Middle - de Paula Fiod

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Comparative analyses of the nuclear lens opacification by Oculus Pentacam and Lens Opacities Classification System (LOCS III)

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Purpose: To compare the nuclear lens density acquired by Pentacam Scheimpflug imaging with Lens Opacities Classification III (LOCS III). **Design:** Comparative and observational transversal study **Methods:** Based on LOCS III, sixty eyes were chosen with different nuclear lens opacification grades and divided in six groups of ten eyes each. The first group had its nuclear opacity graduated between 1,0 and 1,9; the second 2,0 – 2,9; the third 3,0 - 3,9; the forth 4,0 – 4,9; the fifth 5,0 – 5,9 and the sixth 6,0 – 6,9. Each of those eyes was submitted to the Pentacam examination. The Pentacam Scheimpflug image and the values provided by the graphic of lens density were compared with the different values of clinical classification. The mean difference, standard deviation (SD) and 95% limits of agreement (LOA) were calculated.   **Results:** in progress. **Conclusion:** There is a direct correlation between LOCS III and the graphic of lens density, especially in smaller nuclear opacities.