Project Bibliography

By Ederson Moreira dos Santos

- Rozenfel'd, B. A. A history of non-Euclidean geometry. (Studies in the history of mathematical and physical sciences; 12). Translation of: Istoriia neevklidovo_ geometrii. Springer-Verlag, New York, 1988. It contains: Spherical Geometry; the theory of parallels; geometric transformations; geometric algebra and the prehistory of multidimensional geometry; philosophy of space; Lobacevskian geometry; multidimensional spaces; the curvature of space; groups of transformations; and applications of algebras.
- Bonola, Roberto Non-Euclidean geometry, a critical and historical study of its developments.
 Dover publications, INC, 1955. It contains: the attempts to prove Euclid's parallel postulate; forerunners of non-Euclidean geometry; the founders of non-Euclidean geometry; and the latter development of non-Euclidean geometry.
- Carmo, M. P. Geometria Não-Euclidiana, Matemática Universitária, N-6, 1987. It contains an exposition of Poincarè's model for Hyperbolic Geometry.
- H. S. M. Coxeter, F. R. S., Non-Euclidean geometry. University of Toronto Press, Great Britain 1961. It contains: The historical development of non-Euclidean geometry; real projective geometry: foundations, polarities, conics and quadrics; homogeneous coordinates; elliptic geometry in one, two, and three dimensions; descriptive geometry; Euclidean and hyperbolic geometry; hyperbolic geometry in two dimensions; circles and triangles; the use of a general triangle of reference; area; and Euclidean models.
- Wolfe, Harold E., Introduction to non-Euclidean geometry. The Dryden Press, New York, 1948.
 It contains: the foundations of Euclidean geometry; the fifth postulate; the discovery of non-Euclidean geometry; hyperbolic plane geometry and trigonometry; application of calculus to the solution of some problems in hyperbolic geometry; elliptic plane geometry and trigonometry; and the consistency of non-Euclidean geometries.
- Greenberg, M. J., Euclidean and non-Euclidean geometry, development and history. W. H. Freeman and Company, New York, 1980. It contains: Euclid's geometry; logic; Hilbert's axioms; neutral geometry; history of the parallel postulate; the discovery of non-Euclidean

geometry; independence of the parallel postulate; philosophical implications; geometric transformations; and further results in hyperbolic geometry.

- <u>http://www.members.tripod.com/~noneuclidean/history.htmlIt</u> contains a little history of non-Euclidean geometry, but the link <u>http://www.members.tripod.com/~noneuclidean/whatisit.html</u> contains a program where we can draw some picture in a circle, what is Poincaré's model (in a circle) for hyperbolic geometry.
- <u>http://cs.unm.edu/~joel/NonEuclid/</u> It contains both disk and upper half-plane plane models to Hyperbolic Geometry.
- <u>http://cvu.strath.ac.uk/courseware/msc/jgraves/HyperbolicGeometry.html</u> It contains a list of theorems in Hyperbolic Geometry.