NASA JOHNSON SPACE CENTER ORAL HISTORY PROJECT
BIOGRAPHICAL DATA SHEET

NAME: Dorothy B. Lee

ORAL HISTORY: 10 November 1999

EDUCATIONAL BACKGROUND:
BA in Mathematics, Randolph-Macon Women's College, Lynchburg, Virginia, 1948

PRE-NASA CAREER:
NACA Langley Aeronautical Laboratory, Hampton, Virginia
Mathematician (1948-1953)
Senior Mathematician (1953-1956)
Aerotechnologist, Heat Transfer (1956-1958)

NASA CAREER:
NASA Space Task Group, Langley Research Center, Hampton, Virginia
Aerotechnologist, Heat Transfer (1958-1962)

NASA Manned Spacecraft Center/Johnson Space Center, Houston, Texas
Aerospace Engineer, Fluid and Flight Mechanics, (1962-1963)
Aerospace Engineer, Advanced Spacecraft Technology Division, (1966)
Aerospace Engineer, Structures and Mechanics Division, (1966-1972)
Senior Aerothermodynamics Engineer/ Subsystems Manager, Space Shuttle Aerothermodynamics (1972- date unknown)
Aerospace Engineer, Advanced Programs Office (1986-1987)

CURRENT OCCUPATION: Retired

PROFESSIONAL & HONORARY SOCIETIES:
- Associate Fellow, American Institute of Aeronautics & Astronautics

AWARDS & CITATIONS:
- Johnson Space Center Superior Performance Award, 1970
- Nominee for the Society of Women Engineers Achievement Award, 1972
- Johnson Space Center Superior Performance Award, 1973
- Johnson Space Center Superior Achievement Award, 1974
- Nominee for the Society of Women Engineers Achievement Award, 1974
- National Aeronautics and Space Administration nominee for the Federal Woman's Award, 1975
- Nominee for the Society of Women Engineers Achievement Award, 1975

- One of Five Women Honored for Science Display at the Museum of Natural Science in Houston, 1976
- National Aeronautics and Space Administration nominee for the Federal Woman's Award, 1976
- Nominee for the Society of Women Engineers Achievement Award, 1977
- Nominee for the Society of Women Engineers Achievement Award, 1981
- Nominee for the Women in Science and Engineering Award, 1985

SELECT PUBLICATIONS:

Bland, William M. Jr., Charles B. Rumsey, Dorothy B. Lee, and Ronald Kolenkiewicz. "Free Flight Aerodynamic Heating Data to a Mach Number of 15.5 on a Blunted Conical Nose with a Total Angle of 29 Degrees." NACA RM LI57F28, 1 August 1957.

Erb, R. Bryan, Dorothy B. Lee, Kenneth C. Weston, and David H. Greenshields. "Aerothermodynamics – The Apollo Experience." Presented by Dorothy B. Lee at the Heat Transfer and Fluid Mechanics Institute, University of California, San Diego, La Jolla, California, 19-21 June 1967.

Lee, Dorothy B. "Flight Performance of a 2.8 KS 8100 Cajun Solid-Propellant Rocket Motor." NACA RM L56K01, 21 January 1957.

Lee, Dorothy B. "Trajectory Influence on the Heating Distribution Around the Apollo Command Module." NASA-TM-X-65127, 26 May 1965.

Lee, Dorothy B. "Apollo Entry Trajectories and Their Associated Thermal Environment." Presented to the NASA Research Advisory Committee on Space Vehicle Aerodynamics, 28-29 October 1965.

Lee, Dorothy B., John J. Bertin, and Robert C. Ried. "Apollo Reentry Heating." NASA-MSC-Working Paper 1089, 13 September 1963.

Lee, Dorothy B., John J. Bertin, and Winston D. Goodrich. "Heat Transfer Rate and Pressure Measurements Obtained During Apollo Orbital Entries." N70-41158 NASA-TN-D-6028, October 1970.

Lee, Dorothy B., and Maxime A. Faget. "Charts Adapted for Van Driest's Turbulent Flat-Plate Theory for Determining Values of Turbulent Aerodynamic Friction and Heat-Transfer Coefficients." NACA TN3811, October 1956.

Lee, Dorothy B., and Winston D. Goodrich. "The Aerothermodynamic Environment of the Apollo Command Module During Superorbital Entry." N72-23946 NASA-TN-D-6792, April 1972.

Lee, Dorothy B., Robert C. Ried, Jr., Bradley B. Harmell and Kenneth C. Weston. "Advances in Apollo Aerothermodynamics." Presented by Dorothy B. Lee at the

American Institute of Aeronautics & Astronautics Entry Vehicle Systems and Technology Meeting, Williamsburg, Virginia, 3-5 December 1968.

Lee, Dorothy B., Charles B. Rumsey and Aleck C. Bond. "Heat Transfer Measured in Free Flight on a Slightly Blunted 25 Degree Cone Cylinder Flare Configuration at Mach Numbers Up to 9.89." NACA RM L58G21, 26 September 1958.

Lee, Dorothy B., and Andrew G. Swanson. "Heat Transfer Measured on a Flat Faced Cylinder Flare Configuration in Free Flight at Mach Numbers from 1.6 to 2.7." NACA RM L58A06, 3 February 1958.

Lee, Dorothy B. "Apollo Experience Report: Aerothermodynamics Evaluation." N72-25923 NASA-TN-D-6843, June 1972.

Ried, Robert C., Dorothy B. Lee, and N. C. Willis. "Stagnation Point Radiative Heating Estimates for Blunt Reentry Vehicles." NASA-MSC-Internal Note 64-ET-64, 13 September 1963.

Rumsey, Charles B., and Dorothy B. Lee. "Measurements of Aerodynamic Heat Transfer and Boundary-Layer Transition on a 10 Degree Cone in Free Flight at Supersonic Mach Numbers up to 5.9." NACA RM L56B07, 26 April 1956.

Rumsey, Charles B. and Dorothy B. Lee. "Measurements of Aerodynamic Heat Transfer and Boundary Layer Transition of a 15 Degree Cone in Free Flight at Supersonic Mach Numbers up to 5.2." NACA RM L56P26, 15 October 1956.

Rumsey, Charles B. and Dorothy B. Lee. "Measurements of Aerodynamic Heat Transfer on a 15 Degree Cone Cylinder Flare Configuration in Free Flight at Mach Numbers Up to 4.7." NACA RM L57J10, 22 January 1958.

Rumsey, Charles B. and Dorothy B. Lee. "Heat Transfer Measurements in Free Flight at Mach Numbers Up to 14.6 on a Flat-Faced Conical Nose with a Total Angle of 29 Degrees." NACA RM L57L03, 24 January 1958.

Rumsey, Charles B. and Dorothy B. Lee. "Heat Transfer Measurements on a Blunt Spherical Segment Nose to a Mach Number 15.1 and Flight Performance of the Rocket Propelled Model to a Mach Number of 17.8." N65-28448, November 1959.

BIOGRAPHICAL REFERENCES:

Dorothy B. Lee, Personnel Record, Human Resources Office, Lyndon B. Johnson Space Center, Houston, Texas.

Dorothy B. Lee, Key Personnel File (Inactive), Awards Office, Lyndon B. Johnson Space Center, Houston, Texas.

Telephone Directories, Manned Spaceflight Center and Johnson Space Center, 1964-1986, Scientific Technical and Information Center, Lyndon B. Johnson Space Center, Houston, Texas.

BIOGRAPHICAL DATA SHEET CREATED: 2 JUNE 1999