

Department of Physics

E-content (B.Sc. II, 4th Semester)

Subject: Statistical Physics II

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Lectures/PPT

1. Thermodynamic Potentials

https://docs.google.com/presentation/d/1kAVrUUHmgZLDkPIWf51MiWVMFSLqhS94/edit?usp=share_link&ouid=104539033769532935840&rtpof=true&sd=true

2. Maxwell equations and applications

https://docs.google.com/presentation/d/1uvXSpPRob1Q2yWtR0FL-baLhScFqGKO-/edit?usp=share_link&ouid=104539033769532935840&rtpof=true&sd=true

3. Clapeyron equation

https://docs.google.com/presentation/d/1kVzPK8qvUUqh5m3l3kjioDL6_iToXfjF/edit?usp=share_link&ouid=104539033769532935840&rtpof=true&sd=true

4. Joule- Thomson Effect

https://drive.google.com/file/d/1ZcElo-VQ4XSeK79u47ZusV23LeeanaDU/view?usp=share_link

5. Joule- Thomson Coefficient

https://drive.google.com/file/d/1j6_2MBJMUv3AP1dhgwEy_o3P-XItszeZ/view?usp=share_link

6. Adiabatic demagnetization theory

https://drive.google.com/file/d/1sPVXF3XmG_KKYlqSibl0qBdLrVveuKkX/view?usp=share_link

7. Adiabatic demagnetization experiment

https://drive.google.com/file/d/1589DNQ321kCp7unzRbldfFJZsDr6Ogx3/view?usp=share_link

Questions

1. Long Answer Questions

https://docs.google.com/document/d/1irxq8LT-8LigGtTxs70jk64bi_dKaQqtls2oykgUIQE/edit?usp=sharing

2. MCQ questions

<https://forms.gle/5QxH7nYtBbcx9VDT8>

Suggested books

1. “Statistical Physics and Thermodynamics”, V.S. Bhatia
2. “A Treatise on Heat” Saha and Srivastava (Indian Press, Ahmedabad, 1972).
3. Thermal Physics by C. Kittel & H. Kroemer, CBS Pub., 1987.
4. Thermal Physics, S.C. Garg, R.M. Bansal, and C.K. Ghosh, TMH, 2000
5. Statistical Physics II by MPH