Analysis and topology preliminary exam syllabus

References.


**Real analysis.** [Ro, Chapters I–V; Ru, Chapters 1–7]


**Fundamentals of multivariable calculus.** [S, Chapters 12–16; Ro, Chapters IX–X; Ru, Chapter 9]

1. Partial derivatives.

2. Multiple integrals.

3. Vector calculus.

**Topology.**


2. Closed sets, limit points, Hausdorff spaces. [M, 17]

3. Continuous functions, homeomorphisms. [M, 18]
