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**NPTEL ONLINE COURSE**

Discrete Mathematics

Functions

Introduction to Onto Function - Part 1

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# Discrete Mathematics

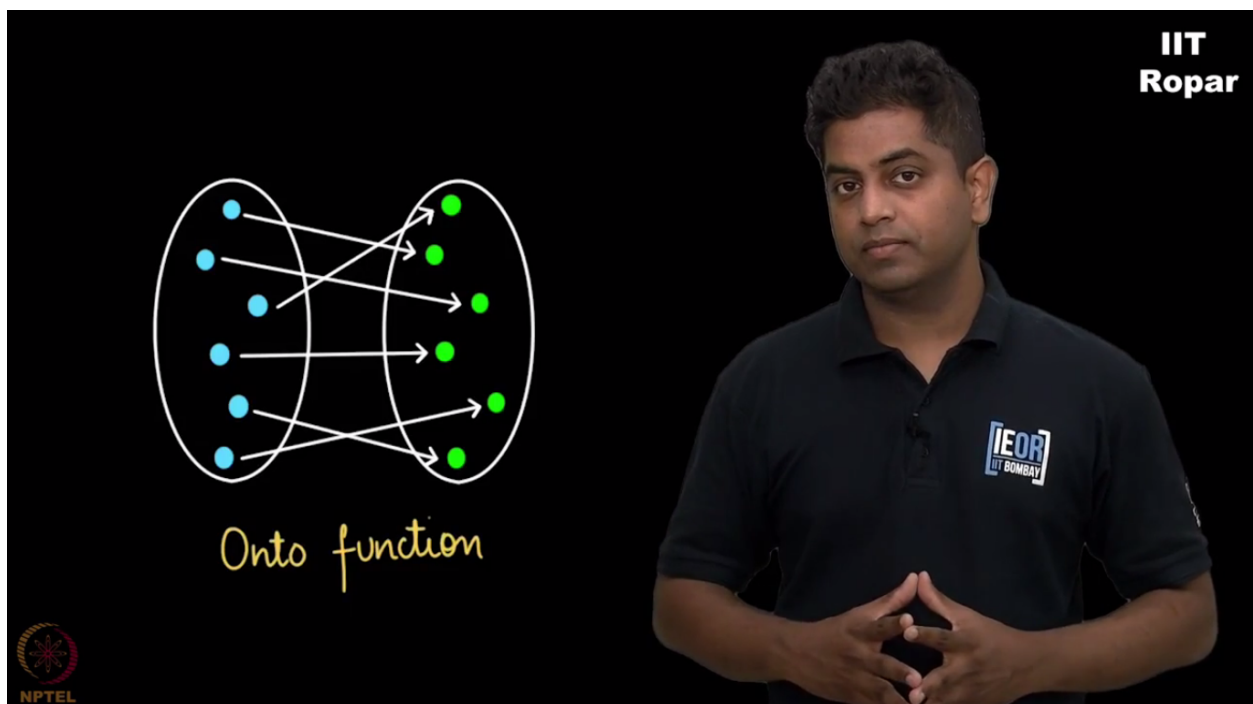
## Functions

### Introduction to Onto Function - Part I

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You see by a function we meant things on this side map to things on this side. We guaranteed you that ever element on the left has some mapping to elements on the right. We never guaranteed that every element on the right is being mapped. It needn't be so to speak.



The image shows a man in a dark polo shirt with "IEOR IIT BOMBAY" on it, standing against a black background. To his left is a hand-drawn diagram illustrating an onto function. The diagram consists of two sets, each enclosed in an oval. The left set contains five blue dots, and the right set contains five green dots. Arrows point from each blue dot to a green dot, with every green dot being the target of at least one arrow. Below the diagram, the words "Onto function" are written in a yellow, cursive font. In the top right corner of the image, the text "IIT Ropar" is displayed. In the bottom left corner, the NPTEL logo is visible.

But then just in case if everything on the right is being mapped by some element on the left which means nothing is left on the right. Such a function is called an onto function.