

MEDIATION: THE CONCEPT

BUSINESS RESEARCH



Mediating variable



A variable that explains the mechanism at work between X and Y

Aka: mediator, intervening variable

Agenda

- Full vs. partial mediation
- Partial mediation:
 - Direct and indirect effect in same direction
 - Direct and indirect effects in opposite direction
- Parallel vs. sequential mediation

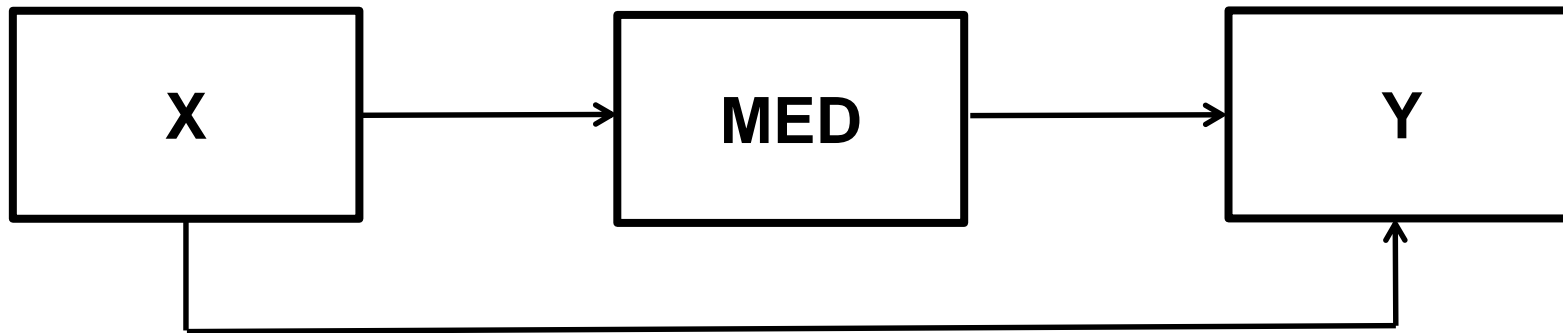
1. Full vs. partial mediation

Full mediation



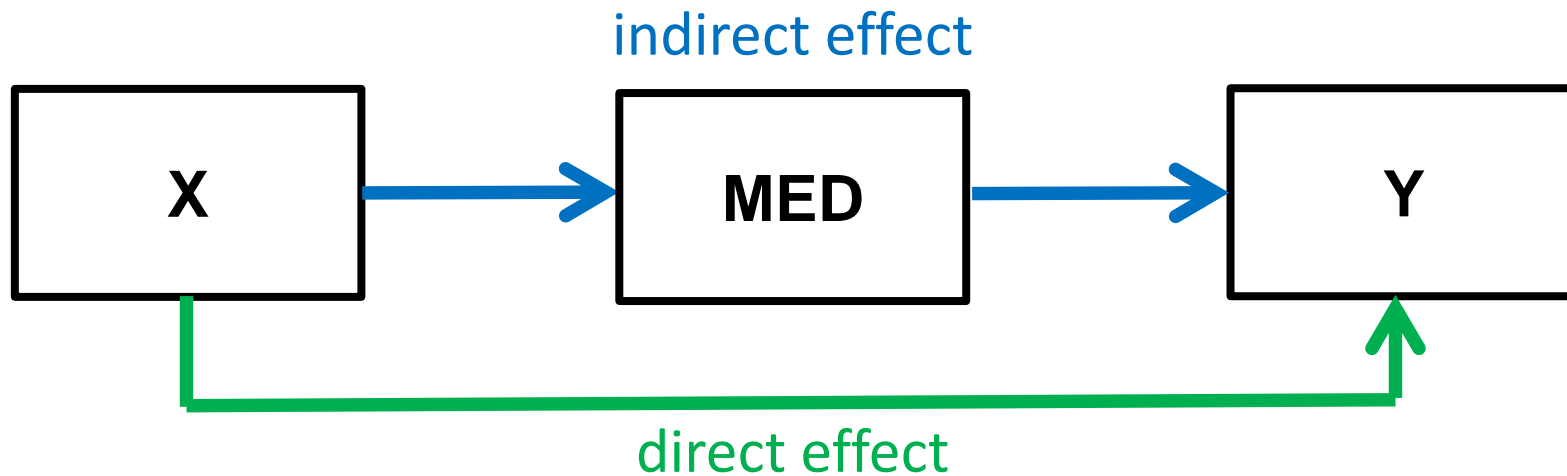
MED **fully** explains the relationship between X and Y

Partial mediation



MED **partially** explains the relationship between X and Y

Partial mediation



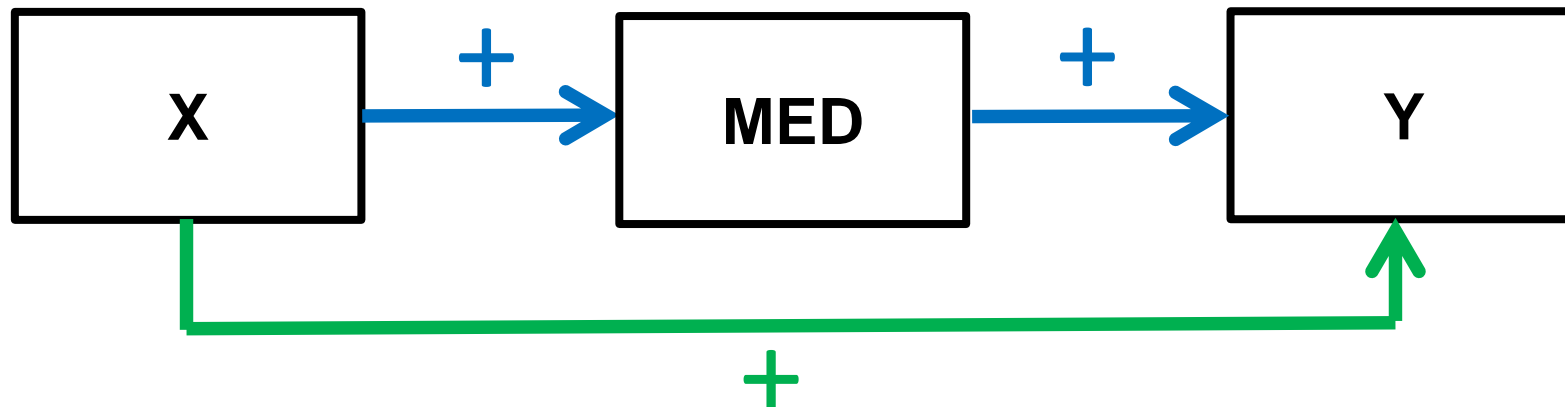
7

Total effect =
Direct effect + Indirect effect

2. Partial mediation:

Direct and indirect effect in same direction

Direct and indirect effect in same direction CASE 1

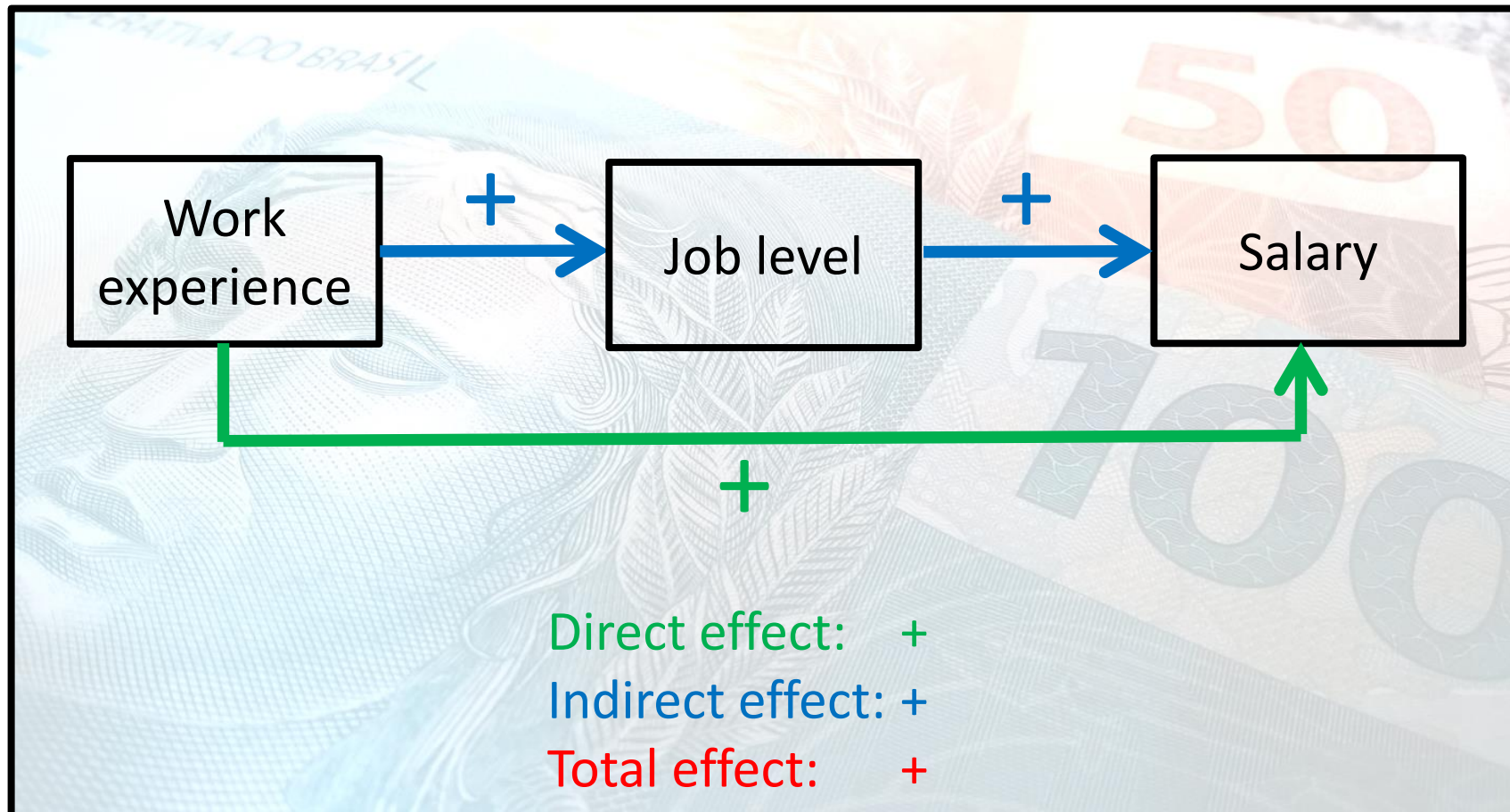


Direct effect: +

Indirect effect: +

Total effect: +

Direct and indirect effect in same direction CASE 1: Example



Direct and indirect effect in same direction CASE 2

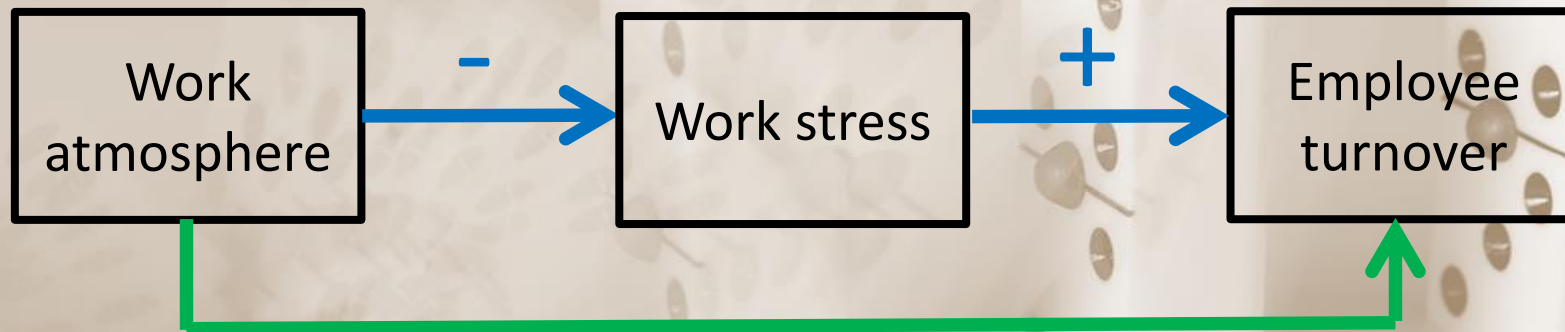


Direct effect: -

Indirect effect: -

Total effect: -

Direct and indirect effect in same direction CASE 2: Example



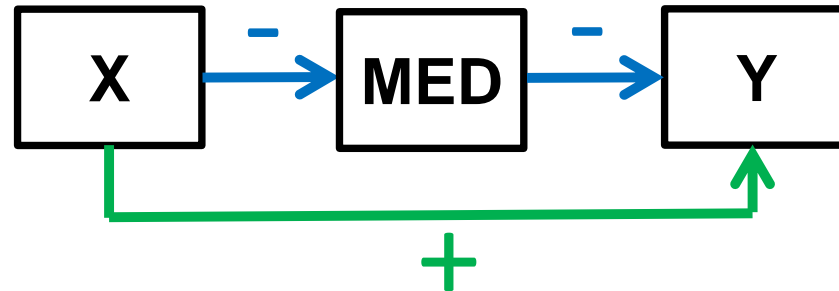
Direct effect: -

Indirect effect: -

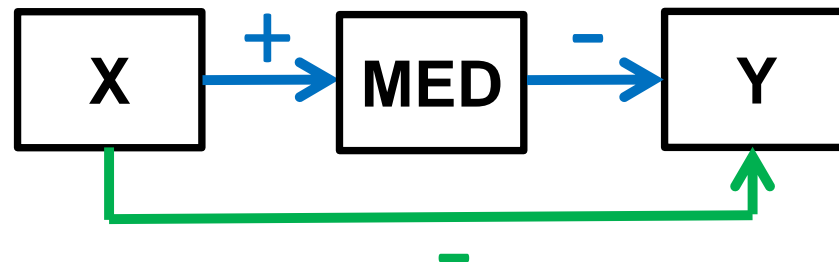
Total effect: -

Direct and indirect effect in same direction CASE 3 and CASE 4

CASE 3



CASE 4



3. Partial mediation:

Direct and indirect effect in opposite direction

Direct and indirect effect in opposite direction CASE 1



Direct effect: -

Indirect effect: +

Total effect: ?

Direct and indirect effects in opposite direction

CASE 1: Example



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Some employers across the country, including retirement homes, hospitals and car centres, are implementing the change

Hardeep Matharu | [@Hardeep_Matharu](#) | Saturday 1 October 2016 08:30 BST | [156 comments](#)



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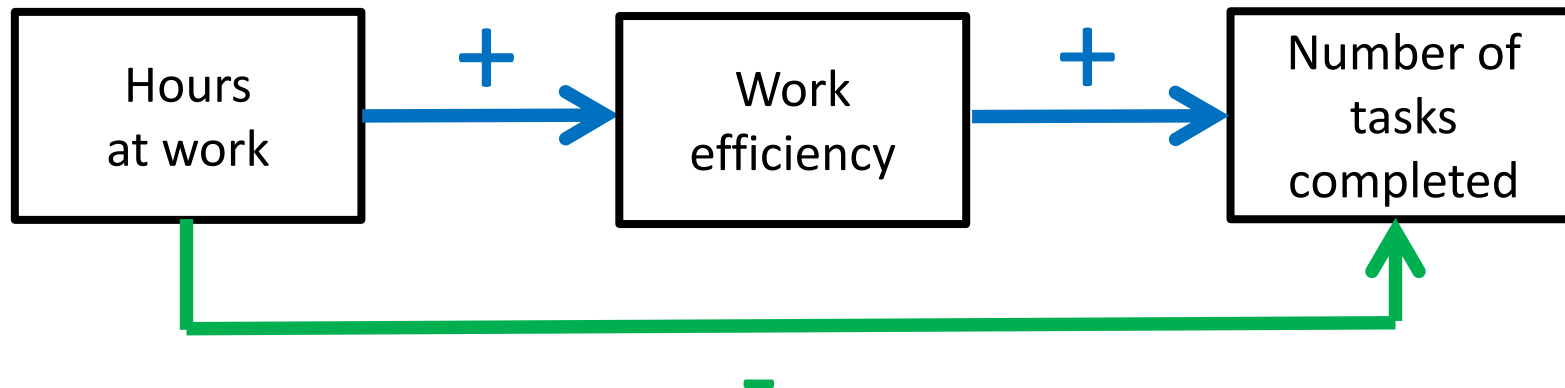
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The Independent Online

Problem statement:

What is the effect of a 6-hour work day (compared to an 8-hour work day) on the number of tasks completed by an employee?

Direct and indirect effect in opposite direction

CASE 1: Example

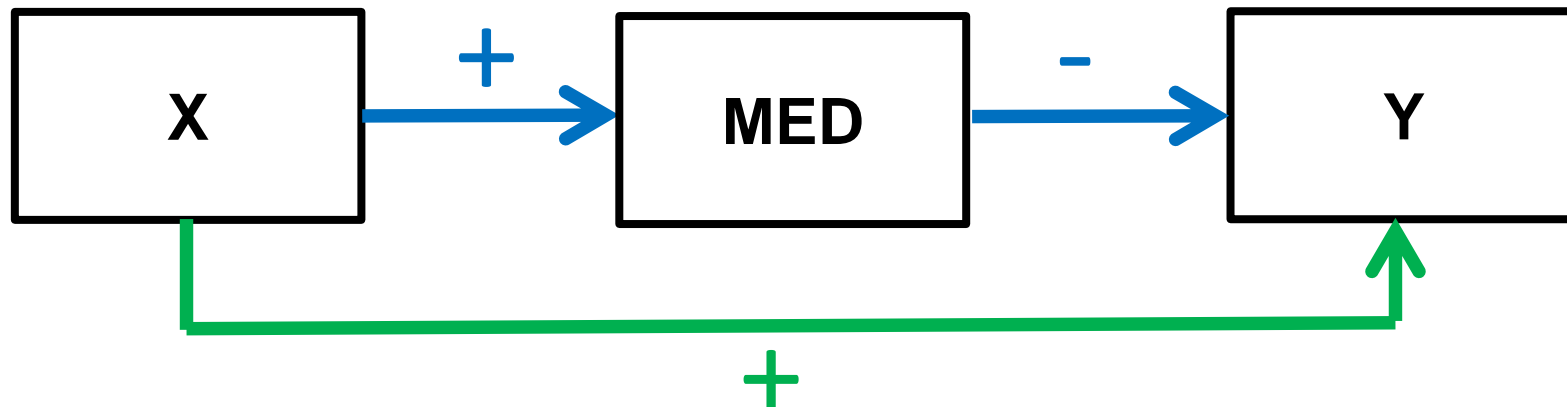


Efficiency up, turnover down: Sweden experiments with six-hour working day

jobs dating more International edition
theguardian

Direct effect: -
Indirect effect: +
Total effect: ?

Direct and indirect effect in opposite direction CASE 2



Direct effect: +

Indirect effect: -

Total effect: ?

Direct and indirect effect in opposite direction CASE 2: Example



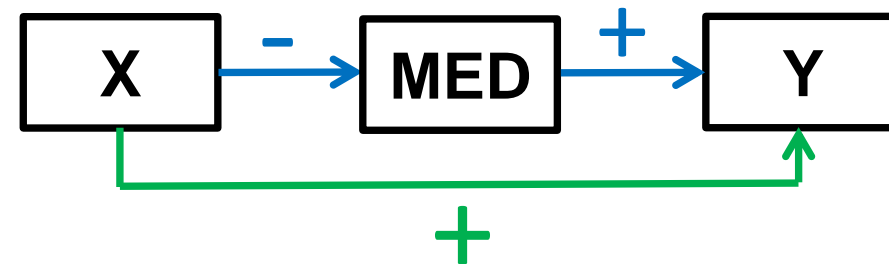
Direct effect: +
Indirect effect: -
Total effect: ?

Direct and indirect effect in opposite direction CASE 3 and CASE 4

CASE 3

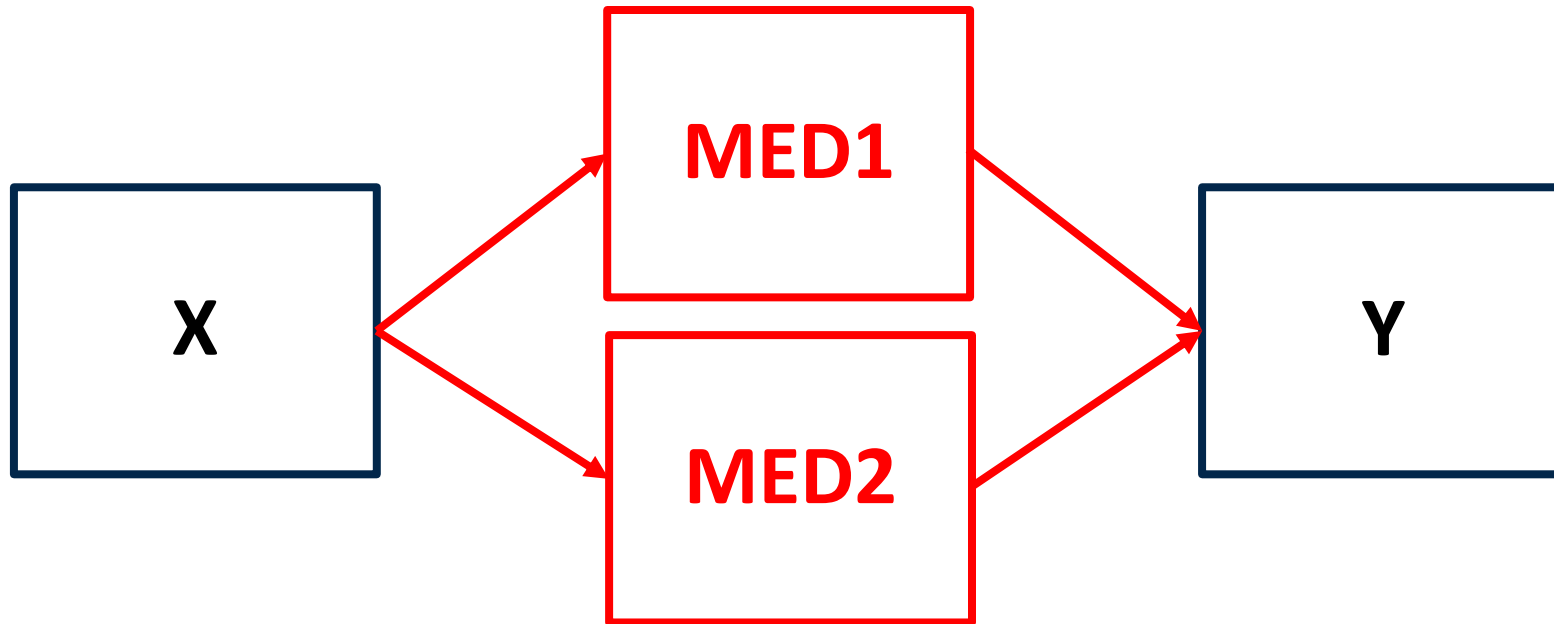


CASE 4

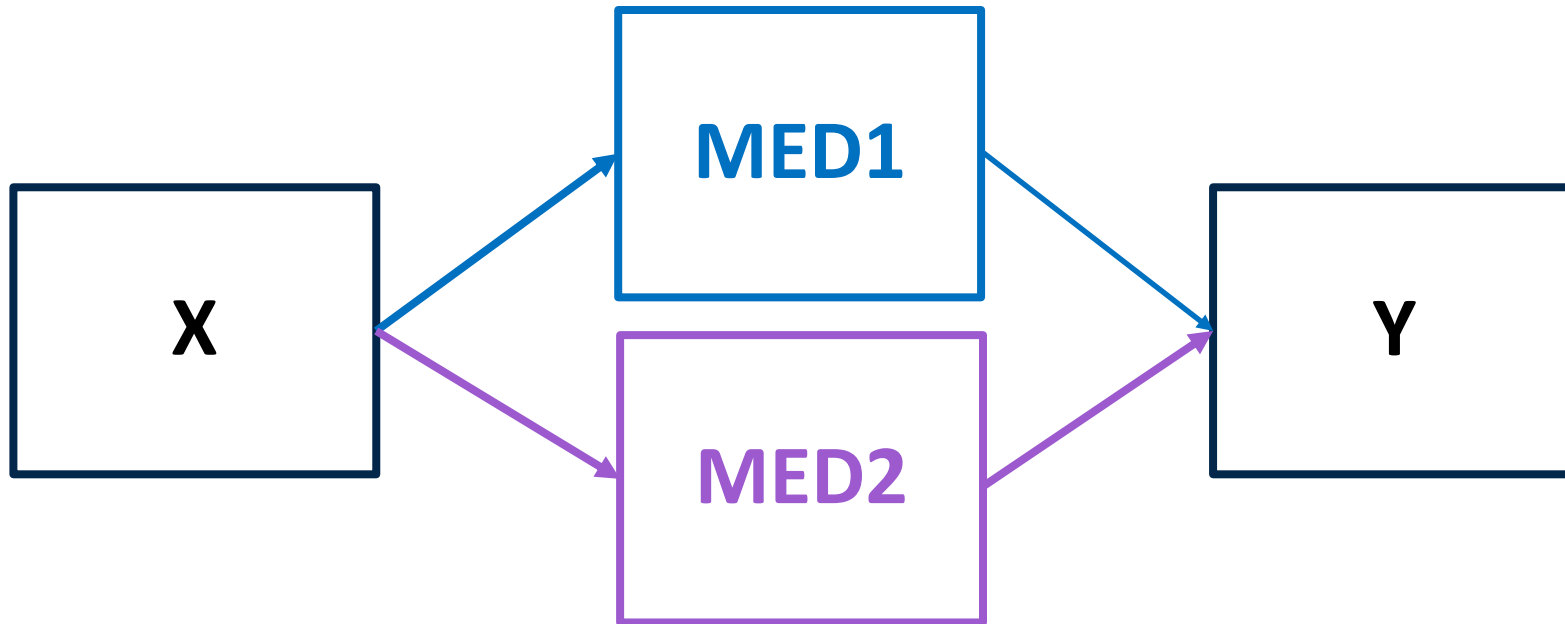


4. Parallel vs. serial mediation

Parallel multiple mediators

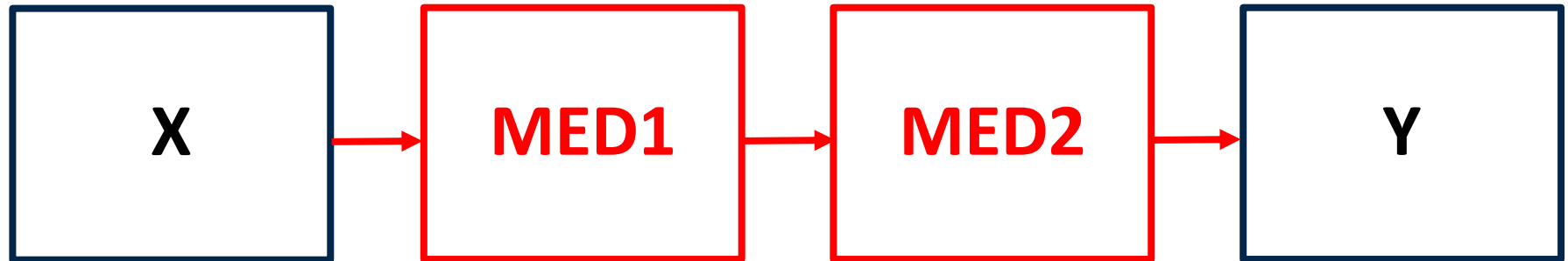


Parallel multiple mediators: Indirect effects



Total indirect effect =
Indirect effect 1 + Indirect effect 2

Serial multiple mediators



Final notes

- Mediation explains **why** there is an effect of X on Y.
- Typically, one or two mediators are studied. Seldom more.
- Partial mediation is standard. Full mediation rarely occurs.
- Parallel mediation is standard. Serial mediation rarely occurs.
- Mediation is most interesting when full mediation occurs.