

# Approaches to deal with confounding

Alternatives to traditional regression adjustment

ERHS 732

# Conditional models

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- ▶ where  $\gamma'$  represents a vector of parameter coefficients for each of our covariates  $C_i$

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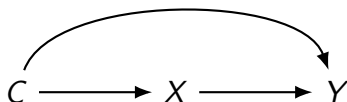
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  - ▶ In other words this is an estimate of the effect assuming all of  $C_i$  remain constant, or within levels of  $C_i$
  - ▶ We could look at effect estimates in strata defined by  $C_i$  and take the weighted average across the strata

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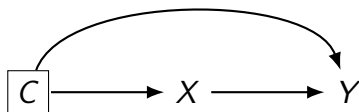
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- ▶ Approaches that minimize the amount of parameters in the model, could therefore be advantageous



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- ▶ Since we no longer have to worry about covariates given the PS this is a dimension reduction procedure

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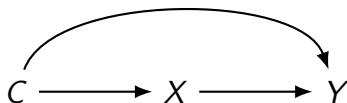
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- ▶ Have to weigh limitations against advantages in each case

# Exposure-confounder feedback

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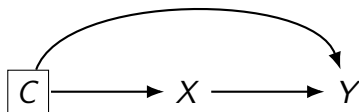
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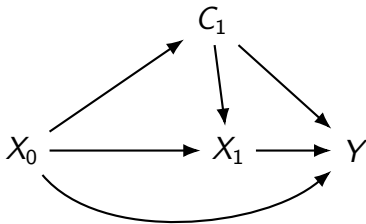
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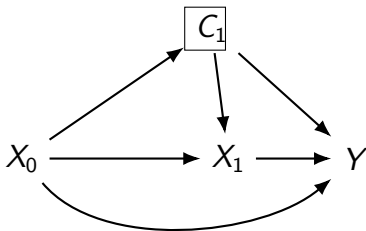
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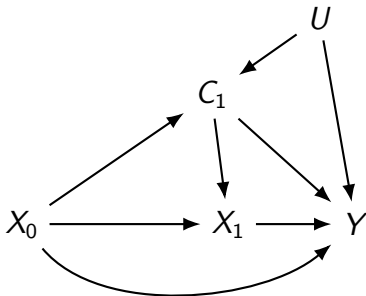
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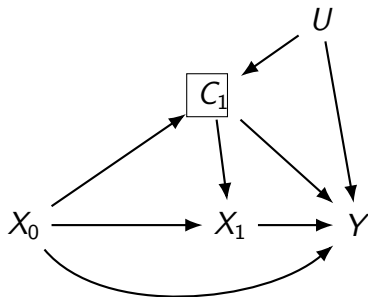
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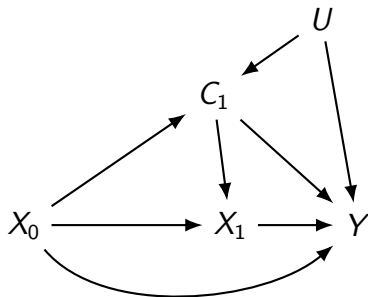
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