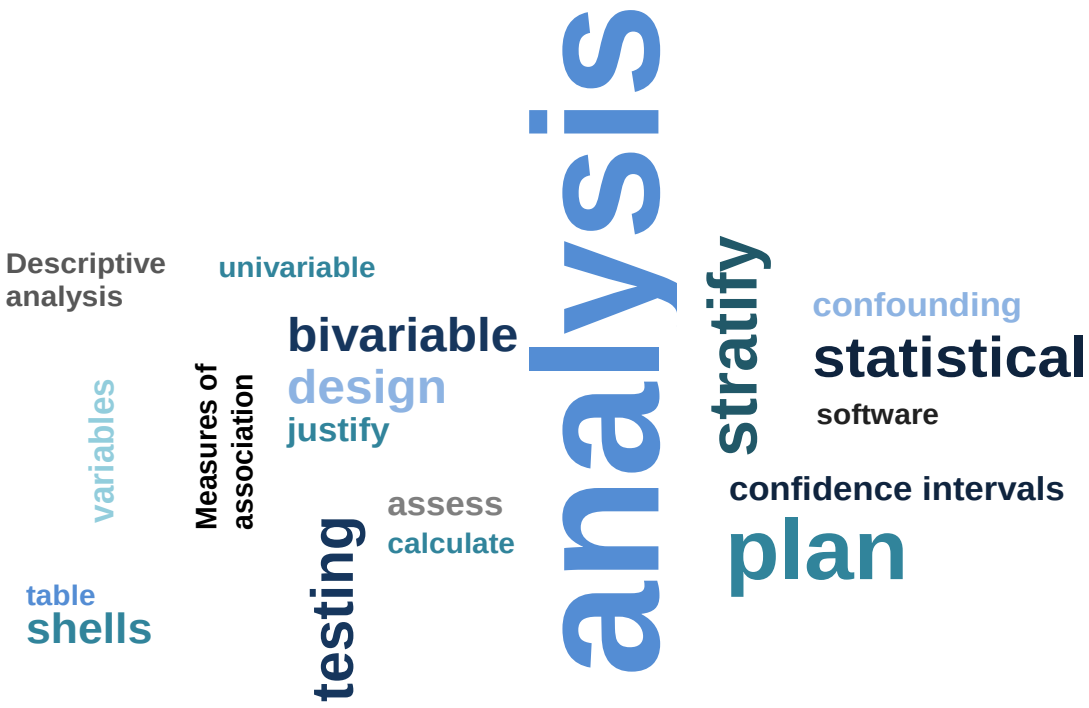
ACTIVITY WORKBOOK




# Creating an Analysis Plan

Created: 2013

*Creating an Analysis Plan*. Atlanta, GA: Centers for Disease Control and Prevention (CDC), 2013.

## Skill Assessment

Estimated time: 2 ½ hours

**Background:**

This skill assessment has four parts or sections. You will work individually to complete the assessment, based on information provided by your facilitator.

**Instructions:**

Your facilitator or mentor will provide you with some background information about an NCD problem and a request for information in your country.

Work with your small group to create the analysis plan by completing the sections below.

**Research question(s) and/or hypotheses:**

**Dataset(s) to be used:**

**Inclusion/exclusion criteria:**

**Variables to be used in the main analysis:** (List 3 or 4 outcomes and exposure variables.)

**Statistical methods and software to be used:** (Answer according to the software you use in *your* country.)

**Prepare Table Shells for Univariable and Bivariable Analyses**

Based on the information provided by your facilitator or mentor, what type of univariable analyses will you conduct? Use the space below to create at least three table shells to prepare for **univariable analysis**.

(continued on next page)

Based on the information provided by your facilitator or mentor, what type of bivariable analyses will you conduct? Use the space below to create at least three table shells to prepare for **bivariable analysis**.

(continued on next page)

**Table shells for calculating measures of association, and conducting confidence intervals and statistical testing**

Based on the information provided by your facilitator or mentor, use the following template to list the variable pairs for which you will test a statistical association.

| Statistical Test | Variables to Assess |
|---|---|
| Chi-square | _____ vs. _____ |
| t-test | _____ by _____ |

Based on the information provided by your facilitator or mentor, fill in the following tables to prepare for calculating measures of association.

**Exposure Variable:**

_____

**Outcome Variable:**

_____

| | **Yes** | **No** | |
|---|---|---|---|
| | | | |
| | | | |
| | | | |

PR =
POR =
**$\chi^2$ =**

**Exposure Variable:**

_____

**Outcome Variable:**

_____

| | **Yes** | **No** | |
|---|---|---|---|
| | | | |
| | | | |
| | | | |

PR =

POR =
**$\chi^2$ =**

| **Exposure Variable:** _____ | | **Outcome Variable:** _____ | |
|---|---|---|---|
| | **Yes** | **No** | |
| | | | |
| | | | |
| | | | |

PR =
POR =
$\chi^2$ =

**Table shells for assessing confounding and effect measure modification (effect modification):**

List at least one potential confounder for your NCD study.

What table shells do you need to prepare to assess for confounding and effect modification? Use the space below to create at least two table shells.

**Let your facilitator know when you have completed the Skill Assessment.**