

考生注意: 1. 依次序作答, 只要標明題號, 不必抄題。

2. 答案必須寫在答案卷上, 否則不予計分, 並限以藍黑色筆作答。

3. 試題隨卷繳回。(餘詳詳閱試場規則)

一. 名詞解釋:(每小題 5 分, 共計 30 分)

1. Grounded Theory
2. Cross-sectional Studies vs. Longitudinal Studies
3. 歸納法 vs. 演繹法
4. 虛無假設 vs. 對立假設
5. 樣本 vs. 母群體
6. 隨機抽樣

二. 是非題:(每小題 4 分, 共計 40 分)

- () 1. 區辨測量尺度之最主要目的是為了進行資料分析時, 用以決定選擇何種統計方法。
- () 2. 建構效度的測量定義是「研究者根據研究主題以測量結果與外在效標之間所產生的相關係數設計出相關的問卷題目」。
- () 3. 質性研究的主要研究工具是研究者本身。
- () 4. 用大選民調(例如針對全台灣有投票權的公民進行樣本數為一千位的電話訪問)的結果來預測誰會當選總統是一種描述統計。
- () 5. 要考驗「經常熬夜者比早睡早起者身體健康情形較差」的假設, 應用雙側檢定。
- () 6. 拒絕虛無假設時, 可能會犯第一類型錯誤。
- () 7. 想要知道參與某一實驗的十名受試者, 其前測與後測的分數是否有所不同, 要用相依樣本 t 檢定。
- () 8. 卡方檢定適合用來處理間斷變項。
- () 9. ANOVA 通常被用來檢定二個母群平均數的差異顯著性。
- () 10. $\sum_{i=1}^N X_i^2 = (\sum_{i=1}^N X_i)^2$

三. 問答題:(共計 30 分)

1. Discuss the risks associated with relying exclusively on probability sampling techniques when studying hidden and oppressed population. Also discuss the advantages of combining probability and non-probability sampling techniques when studying hidden and oppressed population. (本題 8 分)
2. Discuss the reliability and validity issues in quantitative and qualitative research. Please make some examples to prove your arguments. (本題 8 分)
3. Please explain what is "substantive significance (or practical significance)"? What is its meaning to social research? What are the differences between statistical significance and substantive (practical) significance? (本題 6 分)
4. A researcher examines the correlations among three different tests and an outcome measure. The correlations are (1) $r = .45$, (2) $r = -.78$, and (3) $r = .62$. All else being equal, which of these correlations will produce the best overall prediction? (本題 4 分)
5. A psychologist wants to study the effectiveness of a new psychological treatment for depression. He administers a standard test of depression to a large number of subjects, selects those who are the most depressed, and provides them with the new treatment. The vast majority of the subjects experience some improvement in their mood. Can the psychologist assume that the treatment has brought about a relief from the depression? What concept have you learned that can explain these results? (本題 4 分)