ABSTRACT

This paper presents best practices for conducting survey research using Amazon Mechanical Turk (MTurk). Readers will learn the benefits, limitations, and trade-offs of using MTurk as compared to other recruitment services, including SurveyMonkey and Qualtrics. A synthesis of survey design guidelines along with a sample survey are presented to help researchers collect the best quality data. Techniques, including SPSS and R syntax, are provided that demonstrate how users can clean resulting data and identify valid responses for which workers could be paid.

KEYWORDS

MTurk, Qualtrics, Survey, SurveyMonkey

INTRODUCTION

Over the past 25 years, the Internet has progressively become part of how we live our lives. It has changed the way in which we communicate and exchange knowledge. Consequently, the Internet has become a tool for conducting academic and organizational research (Callegaro, Baker, Bethlehem, Goritz, Krosnick, & Lavrakas, 2014; Granello & Wheaton, 2004; Oppenheimer, Pannucci, Kasten, & Haase, 2011). In the field of human resource development, for example, is not uncommon for findings from survey research to inform theory and/or practice (cf. Gubbins & Rousse, 2015; Shuck & Reio, 2011).

Crowdsourcing is a technical innovation that refers to the process of obtaining content by soliciting contributions from a large pool of people, particularly from online communities. Recent studies have found that data collected through crowdsourcing were as good or better than data collected by more traditional survey methods (Behrend, Sharek, Meade, & Wiebe, 2011; Feitosa, Joseph, & Newman, 2015). One of the most popular crowdsourcing services used by social science researchers to recruit participants is MTurk (Buhrmester, Kwang, & Gosling, 2011).

In this paper, we offer a primer to researchers interested in using MTurk for data collection. First, we present MTurk and compare it to other survey participant recruitment services (i.e., SurveyMonkey,
Qualtrics). Second, we discuss the limitations and benefits associated with MTurk. Third, we synthesize best practices for designing a survey to be deployed on MTurk and present an associated example. Fourth, we review the implications of collecting data from MTurk and provide R and SPSS syntax that may be helpful starting places for researchers who are new to collecting data from MTurk.

MTurk

MTurk, short for Amazon Mechanical Turk, is a service offered by Amazon.com, Inc. It was originally designed for internal purposes in which participants would generate descriptors (e.g., “modern,” “vase,” “ivory”) for Amazon products, and in exchange, they received very small financial incentives (Landers & Behrend, 2015). Today, MTurk has evolved into a service that connects researchers (requestors) with respondents (workers) via Amazon’s online marketplace. MTurk recruits individuals for their marketplace by offering small researcher-paid financial incentives for HIT (Human Intelligence Tasks) completion (Buhrmester et al., 2011). MTurk gives researchers absolute discretion over the financial incentive their survey participants receive. Research on MTurk workers indicated that they are younger (millennials >50%), more educated (college degree >50%), and have lower income (Md = $20,000–29,999) (cf. Berinsky, Huber, & Lenz, 2012; Feitosa et al., 2015; Smith, Roster, Golden & Albem, 2015) as compared to the average U.S. population. Therefore, MTurk workers may not be suitable for all studies.

Horton and Chilton (2010) reported that the hourly wage of the typical MTurk worker is $1.38. However, several studies (e.g., Casler, Bickel, & Hackett, 2013; Shapiro, Chandler, & Mueller, 2013) reported rates two to three times as high. MTurk adds a 40% commission to HIT’s total cost plus an additional 5% for Master workers, who are workers who have earned that qualification for consistently receiving positive feedback. Therefore, the cost per survey response for a 10-minute survey can range from $0.30 to $1.00.

Other Recruitment Services

SurveyMonkey and Qualtrics are two of the leading non-traditional survey recruitment and distribution services used in organizational, marketing, and academic research. SurveyMonkey and Qualtrics provide survey responses from their online panels in exchange for researcher-paid incentives/fees. SurveyMonkey and Qualtrics also provide online survey design software that allow individuals with basic computer skills to develop professional looking surveys in very little time (Brandon, Long, Loraas, Mueller-Phillips, & Vansant, 2013).

SurveyMonkey Audience (SMA) is a service that connects researchers with SurveyMonkey’s online pool of members. Each SMA member completes a profile that includes demographic questions when joining a panel, which is used to identify potential participants based on the requested target population. Participants who complete surveys receive a $0.50–$1.00 donation to their charity of choice and, if offered by the researcher, a chance to participate in a sweepstake. The cost for the researcher varies based on the length of the survey. A 30-item survey costs around $3.00–$4.00 per response plus an optional, but recommended, sweepstake incentive of up to $500 (SurveyMonkey, n. d.). Studies that used SMA data have shown a wide range of usable response rates, including reported rates of 16 per cent (Morris, 2013) and 95 per cent (Cook & Lorass, 2013).