Successful entrepreneurs’ post-exit transition to social impact: Evidence from India

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ABSTRACT

We explore whether and how commercial entrepreneurs that have experienced economic success through a financial exit event from their for-profit venture involve themselves in social change activities. Answering this question is theoretically and practically important because we know little about how new economic elites (such as newly wealthy commercial entrepreneurs) bring about social change. Using an imprinting perspective we develop a framework on how achieved and ascribed imprinting elements influence successful commercial entrepreneurs’ subsequent involvement in social change. We argue commercial entrepreneurs get imprinted by achieved attributes such as the quality (proxied by exit valuation) of the commercial venture they build and their prior educational background; in addition we examine imprinting by ascribed attributes such as their age at exit and gender. We tested our framework using a hand collected dataset of 665 Indian entrepreneurs that experienced a successful exit from their for-profit venture during 2003 - 2013. Our results suggest that entrepreneurs’ age at exit, gender, overseas educational experiences and exit valuation of their for-profit venture are important predictors of their involvement in social change activities. We discuss our contribution to the literatures on entrepreneurship and social impact.
There is a renewed interest in scholarship on elites, driven in part by evidence on potentially durable inequality between elites and others (Piketty, 2014). By elites we mean actors with vastly disproportionate access to or control over resources (Khan, 2012). Though elite status is often inherited, scholars working mainly in the United States have documented how commercial entrepreneurship is often a route for ‘self-made’ men and women to become newly minted members of the economic elite (Keister, 2005). Further, even though elites are often seen as the engines driving inequality in economic, social and political terms (Khan, 2012), the academic literature on elites has not shed much light on whether and how new economic elites, such as successful commercial entrepreneurs, might systematically differ in their actions and orientations from the traditional elite. Indeed the sparse research on entrepreneurial exits (see a recent review by DeTienne and Karl Wennberg, 2015) is focused mainly on the determinants of exit decisions such as when and how to exit rather than the post-exit choices faced by successful commercial entrepreneurs.

In parallel, observers have documented the increasing salience in public discourse of social impact activities – grouped under diverse labels such as charitable giving, social entrepreneurship, venture philanthropy and so forth - as a potentially effective mechanism for dealing with thorny societal problems including poverty and inequality in access to basic resources (Dees, 2008; Wilson, 2008), especially in emerging economies. Mirroring this attention in public discourse is a small but burgeoning management literature on social entrepreneurship (Short, Moss & Lumpkin, 2009) and corporate philanthropy (Gautier & Pache, 2015) and a sociological literature on individual volunteering (Wilson, 2000) and philanthropy (Bekkers & Wiepking, 2011). Although there is no clear definition in these literatures of what constitutes social entrepreneurship (cf. Mair & Marti, 2006; Santos, 2012; Zahra et al, 2009 for a definitional review) or corporate philanthropy (cf. Gautier & Pache, 2015) or volunteering and social activism (cf Wilson, 2000), there is a general
acknowledgement that involvement in social change encompasses a process of creating social value by identifying and implementing market-based solutions to social problems through a combination of innovation, resourcefulness, persistence and pragmatism.

Some rich, descriptive case studies suggest that the two phenomena – rise of successful commercial entrepreneurs as newly minted members of the economic elite as well as the increasing salience of social impact activity - are theoretically related. For example, Taylor, Coates, Strom, Renz and Holman (2008) using a single case study of Ewing Kauffman, document the processes by which successful commercial entrepreneurs transition from the economic domain to philanthropy. Likewise, Jansons (2014) uses interview data to document the types of philanthropic foundations set up by 45 high net worth business leaders in India to bring about social change. However, we lack systematic evidence on the factors that predict why some successful commercial entrepreneurs subsequently get involved in social change activities while many others do not.

Yet conceptualizing the circumstances under which new economic elites get involved in social change activity is theoretically and practically important for two reasons. First, because new economic elites have endowments of self-made wealth, they may be more successful in pursuing social change that challenges vested interests that seek to preserve the status quo. Hence understanding the factors that influence successful commercial entrepreneurs’ involvement in social change will help shed light on the broader effect of such entrepreneurs on society. In other words, while prior research has shed light on how commercial entrepreneurs impact society primarily in the economic domain as agents of innovation (Schumpeter, 1934) and providers of employment (cf. Shane, 2003), we seek to provide a new answer to the broad question of how commercial entrepreneurs impact society. Our results specify which successful commercial entrepreneur is more likely to take her
accumulated human and social capital and deploy it in non-economic domains of society to solve social problems – what we term as involvement in social change.

Second, researchers focused on determinants of individuals’ social activism (e.g. Wilson, 2000) note that little attention has been paid to how the social context spurs some individuals and not others to engage in social activism and volunteering. Gaining a richer understanding of how the social context spurs some individuals into engaging in social impact is one way to respond to critiques that our theories have a tendency to idealize individuals engaged in social change as ‘heroic great men who change the world’ (see the arguments made by Dacin, Dacin & Tracey, 2011). In sum, we don’t know enough about how the two domains of commercial entrepreneurship and social impact interact. Are these two domains complements or substitutes or simply unrelated? Understanding the link between commercial entrepreneurship and social impact is thus critical to develop insight on how new economic elites shape civil society.

Hence our specific research question: Which successful commercial entrepreneurs subsequently get involved in social change? We use an imprinting perspective (Marquis & Tilcsik, 2014; Stinchcombe, 1965) to answer this question. The essence of our argument is that commercial entrepreneurs that have been imprinted in particular ways episodically during their life course are more likely than others to get involved in social change after their success as commercial entrepreneurs. We develop a framework comprising achieved and ascribed imprinting elements and examine how they influence involvement in social change. We argue commercial entrepreneurs get imprinted by achieved attributes such as the features of the commercial venture they build and the types of educational experiences they go through during early adulthood as well as ascribed attributes such as their age at exit and gender.
Given the novelty of the question and the context, we use a mixed methods approach. Specifically, we conducted semi-structured interviews with 10 successful Indian entrepreneurs who recently experienced a financial exit event to better understand the phenomenon, ground our conceptual model and to illustrate the potential mechanisms at work in our quantitative dataset. Our quantitative dataset comprised the population of 665 Indian entrepreneurs that experienced a successful exit from their for-profit venture during 2003 - 2013. Our logit analysis results lend support to our conceptual framework that imprinting episodes during early adulthood as well as during the building of the commercial venture are important predictors of successful commercial entrepreneurs’ subsequent involvement in social change.

THEORY & HYPOTHESES

Commercial entrepreneurship has long been a critical engine of wealth creation in market societies and much scholarship in the management literature has been devoted to understanding the entrepreneurial process underpinning pursuit of for-profit ventures (see Shane, 2003 for an overview). In contrast, the scholarly attention paid to social enterprise has been much more recent (Short, Moss & Lumpkin, 2009).

One strand of the social enterprise literature has focused on supply side factors. Thus there is evidence of the prevalence of social enterprise activity across a range of countries (Lepoutre et.al, 2013). Estrin, Mickiewicz and Stephan (2013) find that national-level formal institutions and informal institutions are important drivers of entry into social enterprise – in other words social entrepreneurs are more likely to emerge under certain societal contexts – compared to others. In tandem, scholars have also developed conceptual models and typologies of social entrepreneurs based on the type of social change that they attempt to bring about (Zahra et.al. 2009), the geographical embeddedness of the social entrepreneur
While the literature has shed light on institutional contexts that promote individuals’ entry into social change efforts and the types of social changes that are pursued, there is a significant gap in our knowledge: We know very little about who are the individuals that make this transition to pursue social change. Are they part of the existing elite? Or are they outsiders to the system who are implicitly challenging the entrenched status quo? Moreover, as Dacin et.al. (2011) note, much extant work on social entrepreneurship is focused on case studies of ‘heroic’ social entrepreneurs with the intention to change the world; this idealistic assumption about social entrepreneurs could be potentially misleading because it confounds issues of ability with issues of motivation and interests (Dacin et al, 2011).

We aim to bridge these gaps in our understanding by exploring factors that predict which successful commercial entrepreneurs get involved in social change efforts. The population of successful commercial entrepreneurs is especially interesting because their experience in building and scaling new organizations could potentially be deployed in social change efforts – should they be motivated to transition into getting involved in social change activities.

**Motivational antecedents of pro-social action**

Involvement in social change is an instance of pro-social behavior – which refers to planned and long-term helping actions that occurs after the helper has deliberated on the costs and benefits of the action and occurs over an extended period of time (Dovidio et al 2006). Important classes of pro-social behaviors include volunteering and community activism. Volunteering refers to unpaid service given freely to existing non-profit organizations that directly or indirectly delivers goods or services to needy others in the community (Wilson,
Community activism often entails identifying a helping need in the community and may involve setting up refers to the setting up of such non-profit organizations (Dovidio et al., 2006).

Psychologists have identified four basic motives that underline individuals’ propensity to engage in pro-social actions. Batson and colleagues (2002) identify egoism, altruism, collectivism, and principlism as four motivational forces that can lead to pro-social action. Batson and colleagues view these forces as situational states not accessible to consciousness, that differ in the ultimate goal or objective that characterizes them. Thus, egoism refers to motives when the ultimate goal is to alleviate pain and increase pleasure in ourselves; altruism is achieving the same end but the object is another person whom we perceive as needy; collectivism is achieving the same end but the object is a concrete group with which we identify or feel a link to; finally principlism refers to motives directed towards universal and impartial good to uphold a specific moral principle.

Snyder and Omoto (2007) arrive at a similar list of motivational orientations that drive pro-social behavior, but from a functionalist standpoint. These are (i) self-esteem enhancement - that refers to the wish to feel better about oneself (ii) knowledge – that refers to wanting to develop skills about how to deal with people in need (iii) social ties – this refers to the desire to build one’s social network and finally (iv) community concern – that refers to the wish to support and assist a specific community of people in need and a sense of duty to help arising from personal guiding values (affirming values).

Empirical evidence on the factors that motivate pro-social behavior such as volunteering and activism is mainly drawn from the United States among populations of working age adults, who are usually employees rather than entrepreneurs. Our qualitative interviews provide face validity for these motives and orientations identified in the social psychology literature in our particular study context of commercial entrepreneurs in India.
However, we do not have access to the psychology of the individuals in the phenomenon we are studying. Rather, we build our conceptual framework by outlining how motives and orientations are likely to be shaped based on entrepreneurs’ experiences during their life course. Specifically, as detailed below, motives and orientations that encourage pro-social action in this study were obtained from an imprinting theory (Stinchcombe, 1965) perspective.

**An Imprinting Framework**

Stinchcombe (1965) suggests that individuals and organizations are imprinted by the prevailing institutional environment at birth, when they are especially susceptible to such influences. Marquis and Tilscik (2013) reviewed this research stream and extended the conceptualization of imprinting effects to argue that actors get imprinted not just at birth but during sensitive periods and actors can experience multiple such sensitive periods during their history. The source of imprinting (i.e. the imprinting element) can be economic and technological factors, institutional factors as well as individual level factors (Marquis & Tilscik, 2013).

In this study, we examine imprinting occurring during two specific sensitive periods of an individual entrepreneur’s life course, when they are more susceptible to external influences. The first sensitive period is the individual’s higher education experiences that he or she experiences during early adulthood. The second sensitive period is the period of building a for-profit start-up venture from founding to a successful exit – through sale or IPO.

Further, we focus on two types of imprinting elements: achieved as well as ascribed elements. By achieved imprinting element, we refer to organizational or individual level sources of imprinting that are a result of accomplishments. In our study context, we focus on the following achieved imprinting elements: (i) the quality of the for-profit venture (proxied by the financial valuation at exit) that the focal commercial entrepreneur built and (ii) the
eliteness of the Indian higher educational institutions as well as (iii) geographical location (abroad versus India) of the higher educational institutions that the focal entrepreneur attended. In contrast, an ascribed imprinting element is a source of imprinting that is endowed or inherited rather than achieved. In our study context the focal entrepreneur’s age at the time of exit from the for-profit venture as well as the entrepreneur’s gender are ascribed imprinting elements. We now develop specific hypotheses on how these four imprinting elements influence a successful commercial entrepreneurs’ subsequent involvement in social change.

**Imprinting by achieved imprinting elements and involvement in social change**

When the entrepreneur builds a higher quality (i.e. more financially valuable) for-profit venture and subsequently exits that venture, she is more likely to become involved in social change for two reasons. First, building a high quality venture will mean greater psychological sense of achievement for the entrepreneur on having accomplished something meaningful in the economic realm. This may provide an impetus to try her hand at a new problem in the non-economic realm. In other words, building a high quality venture makes it more likely to trigger egoism as the driver for a pro-social orientation (Batson, 2002).

Second, building a more high quality (i.e. financially valuable) venture causes the focal entrepreneur to become more visible in broader society through greater media attention. This will lead to greater pressure from society to ‘give back’ now that she is successful. In other words, invocation of the norm of reciprocity (Gouldner, 1960) makes it more likely to trigger community concern (Snyder & Omoto, 2007) as a driver for a pro-social orientation.

Irrespective of egoism or community concern as the specific trigger, our argument is that these motivational drivers of a pro-social orientation channel the entrepreneur’s

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1 Clearly building a financially valuable venture likely makes the focal entrepreneur wealthy. The wealth effect makes it likely that a successful entrepreneur post-exit can spend more time and energy on less remunerative activities such as social change efforts. But as noted in the results section of the paper, exit valuation does not moderate the effects of the other imprinting variables in our data, which suggests to us that wealth effects is less likely to be operative in our sample.
compassion towards broad social problems and to suffering communities (Miller, Grimes, Mcmullen & Vogus, 2012) and hence makes it more likely she commits to actions to alleviate others’ suffering. Hence our prediction:

**H1:** Commercial entrepreneurs who build a more valuable for-profit venture are more likely to become involved in social change activity after their financial exit.

In addition, for at least three reasons, we expect successful commercial entrepreneurs who were educated at prestigious institutions of higher learning in India during their early adulthood to be more likely to get involved in social change subsequent to exit from their for-profit venture.

First, greater education leads to more fungible human capital (Becker, 1964) which means the entrepreneur has greater ability to transfer his skills and knowledge across domains – such as from the for-profit domain to a social domain. Second, higher education also shapes’ individual’s attitudes about the broader social system they are embedded in through the process of identification and attention structuring (March & Olsen, 1989). This process likely increases the motivation of entrepreneurs to engage in social change because of exposure to the broader social context in which she is embedded and thus increases her exposure to the most critical failings in the larger social system. In other words, knowledge could become a motivational trigger for a pro-social orientation (Snyder & Omoto, 2007).

Finally, prestigious educational institutions serve as particularly important sites for shaping individuals’ attitudes toward state and society (Thomas, Meyer, Ramirez & Boli, 1987). Specifically, individuals whose educational attainment provides them access to prestigious national educational institutions are more likely to develop attitudes on the causal effect of such national institutions and the nation-state more broadly on their personal success. Such attitudes make it more likely that the norm of reciprocity (Gouldner, 1960) is triggered.
in the focal entrepreneur such that she is more likely to ‘give back’ to society by transitioning to social change after exit from her for-profit venture. More formally we propose:

**H2:** Commercial entrepreneurs who achieved an elite Indian higher educational experience during their early adulthood are more likely to become involved in social change activity after their financial exit

Likewise we outline two reasons why successful commercial entrepreneurs who experienced at least some higher education abroad (in developed markets) during their early adulthood are more likely to get involved in social change subsequent to exit from their for-profit venture.

First, when the focal individual from an emerging market is resident in a developed market during early adulthood (for higher education), the stark differences in the social infrastructure becomes more salient to the focal individual. This greater salience of the deficiencies and problems in the home country makes it more likely that community concern (Snyder & Omoto, 2007) becomes a driving motive for a pro-social orientation.

Second, a heightened pro-social orientation could be triggered due to mimicry. As Van Baaren et.al. (2004) report, a pro-social orientation could be induced by mere observation of other individuals engage in pro-social behavior, through automatic, non-deliberative cognitive processing. To the extent that residence in developed markets during early adulthood increases the odds of observing pro-social behavior, we would expect a heightened pro-social orientation in the focal entrepreneur who spends at least some time period in a developed economy for higher education. Irrespective of the particular motive that triggers a pro-social orientation, we expect:
H3: Commercial entrepreneurs who achieved some foreign (developed market) higher educational experience during their early adulthood are more likely to become involved in social change activity after their financial exit.

Imprinting by ascribed imprinting elements and transition to social entrepreneurship

In addition, we expect entrepreneurs who are older at the time of exit from their commercial venture to be more likely to transition into social change. As Becker’s (1965) theory of time allocation implies, the opportunity cost of time increases with age since a smaller period of life remains. This greater awareness of one’s mortality is more likely to trigger the entrepreneur’s pro-social orientation because of the need to leave a legacy (Grant & Wade-Benzoni, 2009). This argument suggests:

H4: Commercial entrepreneurs who are older at the time of their financial exit from their for-profit venture are more likely to become involved in social change activity.

Finally, we expect woman entrepreneurs to be more likely to transition into social change because of sex differences in motives that drive pro-social behavior. Specifically, social psychologists have found that women have a more developed sense of empathy, which is an emotion that is required for prosocial behavior (Hoffman, 1977). Likewise, sociologists have noted that women tend to be more charitable than men (see Piliavin & Charng, 1990 for a review). The consensus in these literatures is that philanthropic giving by women tends to be greater than men (see Mesch, 2009 for a review). This line of reasoning suggests that women entrepreneurs are more likely to get involved in social change activities. More formally, we predict:

H5: When compared to women, male commercial entrepreneurs are less likely to become involved in social change activity after their financial exit.
METHODS

Sample and Data Sources

The research sample was drawn from a population of entrepreneurs who founded new business ventures after the start of economic reforms in India (i.e. after 1991) and whose ventures experienced an exit event between the period 2003 and 2013. An exit event could be either a trade sale (M&A) or a public offering (IPO). Since we are interested in successful exits from the perspective of the founding teams, we examine the reported M&A exits to weed out observations that were likely to be ‘distress sales’ that sometime occur in these markets. We used the Venture Intelligence database\(^2\) to identify 127 ventures that had trade sales and met our criterion. For IPO events, ventures were identified from the website of Securities and Exchange Board of India (SEBI)\(^3\) and included ventures that were subsequently listed on one of the stock exchanges in India. We then identified and included data from the handful of ventures that met our criteria and were listed on NASDAQ. Also, since SEBI provides IPO data only from 2003 onward, we restricted the sample to those ventures that had a public offering between 2003 and 2013. Further, we focused only on ventures that were founded by independent entrepreneurs i.e. those without a clear connection to large family business groups, public sector units or foreign companies (MNCs) already operating in India. The private sector in India is dominated by large and old family business groups with considerable resources (Khanna & Palepu, 2000; Vissa, Greve & Chen, 2010) whereas our focus is on independently successful entrepreneurs.

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\(^2\) Venture Intelligence (VI) is a leading source of information and analysis on private company financials, transactions (private equity, venture capital and M&A) and their valuations in India. VI maintains, amongst other databases, the Mergers & Acquisitions Deals Database that lists inbound, outbound and domestic deals involving India-based companies. The database provides the names of the target companies, their acquirers, location, industry & sector, transaction amounts and the deal dates, along with information on advisors to the deals and the target company valuations.

\(^3\) Securities and Exchange Board of India (SEBI) is the primary regulatory body of the securities market in India. Amongst other functions related to monitoring and supervision of the primary market issuances, SEBI maintains a repository of offer documents including the draft, red herring and final prospectus, that companies file at the time of an IPO in India.
We then hand-collected information on the names of the founders of these 362 ventures that had either an M&A exit or an IPO exit. For M&A exits we collected information on the founding teams of the ventures from the original venture Web sites and by using systematic Google search by mentioning the name of each venture and ‘founder’/‘co-founder’. We were able to identify 241 founders associated with ventures that had an M&A exit between 2003 and 2013. We collected the names of the entrepreneurs of the ventures that had an IPO exit between 2003 and 2013 from the prospectus available on the SEBI website. The prospectus filed with the SEBI at the time of an IPO provides the names of ‘promoters’ or person(s) who have the overall control of the business. We identified such promoters who also hold executive directorship positions in their ventures as the founders of the firm. Some entrepreneurs were common in the M&A and the IPO exits and were later dropped from the IPO sample set. These constituted less than ten percent of the total sample. In all there were 532 entrepreneurs associated with the IPO exits. Our methodology yielded a total population of 763 commercial entrepreneurs who had founded their ventures after 1991 and successfully exited from their ventures between 2003 and 2013 either through an M&A deal or through a public offering.

We chose to study ventures founded after the start of economic reforms because prior to the reforms, entrepreneurial activity in the formal sectors of the Indian economy was largely a closed shop due to industrial licensing regulations (the license Raj system). Also the 10-year exit event window between 2003 and 2013 allowed us to observe a sufficiently large number of exits, and a sufficiently long period to observe post-exit career histories of entrepreneurs. We used multiple sources to hand-code data on the 763 entrepreneurs and the 362 exit events. The primary source of information about the founders was the websites of their ventures that provided their biographies. We also collected information from their publicly available LinkedIn profiles, media coverage and online prospectus (for IPO exits).
We lost observations because of missing data on our independent variables. The final sample on which we run our models consists of 665 successful commercial entrepreneurs drawn from 218 ventures that experienced an exit event between 2003 and 2013.

**Measures**

*Involvement in social change*

The dependent variable in this study is whether a successful commercial entrepreneur was involved in social change activity subsequent to her financial exit from the for-profit venture. Our theoretical interest was on whether the entrepreneur’s involvement in social change went beyond just donating financially for favored causes and included active mobilization of her human and social capital towards social change efforts. Hence we define involvement in social change activity as the founding and/or operational engagement of the entrepreneur in organization(s) aimed at bringing about social change in local communities in India. The “gold standard” measure for our theoretical concept of involvement in social change would be to survey the entrepreneurs in our sample to ascertain the mix of specific activities they perform as well as their time allocation, which would allow us to compute a fine grained measure of their involvement in social change. However, poor response rates on pilot surveys required us to develop an alternative approach based on publicly available data, which we outline below.

Our measurement approach was to opt for a binary dependent variable that takes the value “1” if the commercial entrepreneur founded and / or is involved with organization(s) aimed at bringing about social change in local communities in India and 0 otherwise. In order to identify whether a commercial entrepreneur founded and / or is engaged with organizations seeking to bring about social change in local communities, we relied on three sources of

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4 Our qualitative interviews suggested that in fact almost all entrepreneurs routinely gave money to charities and non-profits – and anecdotally, it seems that such charitable giving is routine among salaried middle class Indians, although we lack systematic data to compare with charitable giving rates in the United States.
publicly available data. First, we began by searching the biographies of the entrepreneurs on the websites of the commercial ventures they had (co)-founded to code for any social change activity they were engaged in. Second, we searched for their profiles on LinkedIn for themselves reported engagement in social change activity. Third, we carried out a systematic Google search by mentioning each founder’s name along with the venture name and specific ‘search terms’ related to social change. Table 1 shows the specific search terms that were used for the Google search. Data from these three sources were combined to code whether or not an entrepreneur was involved in social change. We outline the process with an example below.

We coded N.R. Panicker, founder of Accel Frontline as involved in social change by proceeding as follows: First we searched Accel Frontline’s web site as well as Panicker’s LinkedIn in profiles for key words and phrases that might suggest involvement in social change. This yielded information that N.R. Panicker founded Accel Charities Foundation in the year 2011, five years after his commercial venture’s successful IPO. We then also engaged in systematic google search in two steps. In the first step, we searched on the following keywords (a) ‘n r panicker social’ (b) ‘n r panicker accel frontline social entrepreneurship’ (c) ‘n r panicker accel frontline social venture’ (d) ‘n r panicker accel frontline social movement’ (e) ‘n r panicker accel frontline social change’ (f) ‘n r panicker accel frontline charity’ (g) ‘n r panicker accel frontline foundation’. Perusing and drilling down on the search results revealed that N.R. Panicker was involved in social change activities only through Accel Charities Foundation, which focuses on rural development, education and geriatric care. In step 2, we followed the same systematic process but focused on terms associated with political action such as (a) ‘n r panicker accel frontline government’ (b) ‘n r panicker accel frontline political’ (c) ‘n r panicker accel frontline politics’ (d) ‘n r panicker accel frontline political movement’ (e) ‘n r panicker accel frontline political change’ (f) ‘n r panicker accel frontline political action’ (g) ‘n r panicker accel frontline civil society’. However, these
results did not yield any information that could indicate that N.R. Panicker was involved in political action. Based on the positive search results in step 1 as well as the company website, we coded the dependent variable *involvement in social change* as 1 in this instance. Likewise, we coded the dependent variable as 0 for those entrepreneurs for whom none of the three methods (website biographies, LinkedIn and Google search) gave us any indications of his or her involvement in social change related activity.

Using the same approach we also gathered data on other post-exit occupational choices of the entrepreneurs, such as if they worked as full-time employees for another company, founded another business, became a venture capitalist or angel investor, became a mentor to other start-ups or became an advisor to other companies. We first piloted this method of coding the dependent variable on a small set of entrepreneurs in order to train the 2 Research Assistants (RAs) on the coding approach; after refining the method based on the pilot, we supervised the coding done by this group of 2 (RAs). We also randomly sampled about 10% of the coded data to check for coding accuracy.

Our data suggests that about 19% of successful commercial entrepreneurs were also involved in social change efforts in India. To the best of our knowledge, there is no prior work that examines this issue systematically, so we are unable to benchmark this descriptive statistic with prior literature.

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Insert Table 1 about here
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*Independent variables*

We again relied on secondary sources to measure the independent variables in our study. These data sources include on-line information from company websites and LinkedIn,
regulatory filings with the Ministry of Corporate Affairs (MCA)\(^5\) as well as systematic Google searches.

**Exit valuation.** Our measure of the quality of the commercial venture built by the focal entrepreneur is the value of equity of the venture at the time of exit event. We gathered this information from multiple sources. For M&A exits, we used the Venture Intelligence database to calculate the value of equity from the total realized value of the ventures at the time of acquisition. For IPO exits, we calculated the value of equity at the time of IPO using the information on the number of shares outstanding and the share price at the time of IPO, available in the prospectus. The average venture in our sample had an exit valuation of USD 150 million and the median exit valuation was USD 50 million. Since this variable was highly skewed, we logged it to obtain our measure of *exit valuation.*

**Elite university education.** To measure whether the entrepreneurs achieved an elite educational experience we classified universities and institutions (both in undergraduate and graduate degree) as elite if they belonged to either the Indian Institutes of Management (IIMs) for business education or the Indian Institutes of Technology (IITs) for engineering education. IIT and IIM were set up by the government of India as prestigious institutions of higher learning. These institutions are extremely selective in providing admissions. Graduating from IITs or IIMs is seen as a badge of honor and an enduring symbol of elite educational attainment in India.

We collated this information based on exhaustive digital searches on Linked In, company websites and general google searches. *Elite university education* was coded as a binary variable with a value of 1 if either the undergraduate or graduate educational

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\(^5\) Ministry of Corporate Affairs (MCA) regulates corporate affairs in India. MCA provides a unique Director Identification Number (DIN) to individuals who are existing director of a company or intend to be appointed as director of a company. The DIN was used to search for information related to all the entrepreneurs who had been uniquely allotted this number.
institution attended by the entrepreneur was an IIT or IIM, and a value of 0 otherwise. If we could not find this information for a focal entrepreneur, we took a conservative approach and coded *elite university education* as “0”. Our reasoning was that given the elite status of IIT and IIM in India, it is highly unlikely that a digital trace would be missing for an individual that did actually attend these institutions. Note that our overall results are robust when we run models on the reduced sample where we don’t make this assumption and treat such cases with lack of information as missing observations.

**Foreign education.** We measured whether entrepreneurs in our sample had acquired some portion of their university education abroad – in developed economy locations - through an indicator variable. *Foreign education* was coded as 1 if the entrepreneur attended a higher education institution in the North America, Europe, Australia / New Zealand or developed Asia (such as Singapore, Korea, Japan, etc.) and coded as 0 otherwise. We followed the same procedures as above to obtain this information, focusing on linked in profiles, google searches and so forth. If we could not find this information for a focal CEO, we took a conservative approach and coded *foreign education* as “0”. Our reasoning was that given the high status accorded in India to obtaining higher education abroad, in a first-world economy, it is highly unlikely that a digital trace would be missing for an individual that went abroad for higher education. Our results are robust when we run models on the reduced sample where we don’t make this assumption.

**Entrepreneur age at exit.** Age of the entrepreneurs at the time of exit was computed using the date of birth, available in the MCA filings, and the *year of exit* as defined in the control variables below. The average entrepreneur in our sample was 45 years old at the time of the exit event of his for-profit venture.
**Gender.** We coded gender as a binary variable taking the value 1 for men and 0 for women entrepreneurs. Women were highly under-represented in our sample – at about 6 percent.

**Control Variables**

We used several control variables to control for alternative explanations. First we controlled for industry effects because the sample was based on ventures operating across a broad range of industries and propensity to transition to social change might vary with industry as well as our theoretical variables. We used the 2-digit NAICS codes for creating dummy variables for industry. Second we used an indicator variable (IPO) to capture exit modes- with a value of 1 if the exit mode was IPO and 0 if it was M&A. Third, we included dummy variables for the year of exit as the calendar years 2003-2014 to capture any year or cohort effects that might directly or indirectly affect the entrepreneur’s transition into social or political change. Year of exit was defined the as the year in which the exit event took place. For M&A exits, we used the Venture Intelligence database to collect this information, which was coded based on the date of announcement of the trade sale; for IPO exits it was hand-coded from the prospectus. Fourth, we measured the breadth of post-exit activity by measuring whether the focal entrepreneur was also involved in other activity such as formal or informal mentoring, start-up investing as an angel or venture capitalist, and in other for-profit new ventures. We followed the same procedures used to measure the dependent variable to estimate post-exit activity. Our count measure of other activity thus captures whether the entrepreneur in question is engaged in a variety of other labor force activity. Finally, we controlled for the period of time it took the entrepreneur to build the successful for-profit venture since it is likely that involvement in social change could be influenced by the duration of the current for-profit venture building episode. Build duration averaged about 10 years in our sample.
Analysis approach

Given that our dependent variable involvement in social change is binary, we used a logit regression to estimate the likelihood that a focal successful, commercial entrepreneur was involved in social change activity. Since the 665 entrepreneurs in our sample were drawn from 218 ventures, we clustered standard errors on ventures to account for possible non-independence of observations drawn from the same venture.

RESULTS

Table 2 reports descriptive statistics and correlation coefficients for the variables used in the analysis of the dependent variable. Exit valuation and IPO are positively correlated as expected, since IPO exits typically fetch a higher market price. The year of exit is negatively correlated with IPO, suggesting a pick-up in the acquisitions market in India in recent years. Also as expected, other activity is negatively correlated with year of exit, suggesting that entrepreneurs who had a recent exit are less likely to be engaging in a variety of different activity. All other correlation coefficients are small and we conclude that multi-collinearity is not a concern.

Insert Table 2 & 3 about here

Table 3 presents our regression analysis results for testing Hypothesis 1 through to Hypothesis 5 on the drivers of successful commercial entrepreneurs’ involvement in social change. Model 1 includes control variables only. Model 2 adds the achieved imprinting element of exit valuation to test our first hypothesis H1 on the effect of building a valuable venture. Model 3 adds the other achieved imprinting elements of elite university education and foreign education to test our H2 and H3. Model 4 adds the ascribed imprinting elements of entrepreneur age at exit and gender to test our H4 and H5. Finally, model 5 reports our full
model. Since the pattern of results is similar across the models, we interpret the full model results shown in the last column of Table 3.

**Effect of Imprinting Elements on Involvement in Social Change**

Hypothesis 1 predicts that greater valuation of the exited for-profit venture increases the odds of involvement in social change. As can be seen from model 5 of Table 3, the coefficient of *exit valuation* is positive and significant (*p* = 0.05 two tailed), suggesting strong support for H1. In logit models, the dependent variable is the probability of a successful outcome (and so varies between 0 and 1), and the independent variables’ effects are nonlinear, suggesting that graphing the results at relevant values of the independent variables would be useful. Our graphs report adjusted predictions using the *marginsplot* command in Stata, after suitably identifying the factor variables. As can be seen in Figure 1, the probability of involvement in social change almost doubles from 11% to about 20% when exit valuation of the commercial venture increases from about USD 12 million (i.e. Ln exit valuation of 2.5) to about USD 244 million (i.e. Ln exit valuation of 5.5), when other covariates are held at their mean values.

Hypothesis 2 predicts that entrepreneurs who graduate from elite Indian universities are more likely to be involved in social change. The coefficient of *elite university education* is positive but not significant at conventional levels indicating that H2 is not supported by the data. The coefficient of *foreign education* is positive and significant (*p* = 0.10 two tailed), providing good support to H3 that entrepreneurs whose higher educational achievement included overseas education at a developed economy are more likely to transition into social change. Figure 2 reports graphical results of the effect of foreign education on involvement in social change - at high, average and low levels of exit valuation. As can be seen from Figure 2, the predicted probability of involvement in social change rises from 14% (for purely Indian
educated entrepreneurs) to 21% when entrepreneurs have some foreign education – at average levels of exit valuation. Moreover, inspection of the graph reveals no evidence of an interaction effect between exit valuation and foreign education.

The coefficient of entrepreneur age at exit is positive and strongly significant (p=0.001 two tailed), providing strong support for Hypothesis 4 that entrepreneurs who are older at the time of their financial exit from their for-profit venture are more likely to get involved in social change. Figure 3 reports graphical results of the effect of entrepreneur age at exit on involvement in social change - at high, average and low levels of exit valuation. As can be seen from Figure 3, the predicted probability of involvement in social change rises from 9% to 23% when entrepreneur’s age at exit rises from 35 to 55 – at average levels of exit valuation. As can be seen from the graph, there is some evidence that higher exit valuation is even more likely to cause older entrepreneurs to transition to social change.

Finally, the coefficient of male is negative and significant (p = 0.08 two tailed), providing good support for Hypothesis 5 that female commercial entrepreneurs are more likely to transition into social change when compared to their male colleagues. As seen in Figure 4, the predicted probability of involvement in social change decreases from 26% for women entrepreneurs to 15% for men, when exit valuation is held at the mean. Further, as can be seen in Figure 4, there is no significant interaction between gender and exit valuation on the predicted probability of involvement in social change.

Supplementary tests

We were concerned about potential maturation effects where some entrepreneurs get exposed to certain stimuli prior to or in-between the imprinting episodes and hence get involved in social change. We tested for one such possibility by examining if entrepreneurs who were educated in the caring professions and / or had prior work experience in the caring
industries were more likely to get involved in social change. By caring industry or profession we refer to the education and health care domains where the focus is often looking after other people. Analysis of a subsample where we could obtain this data revealed no such effects on involvement in social change.

We also ran supplementary analyses to test alternative explanations on the mechanisms driving our results. Our conceptualization focused on entrepreneurs who achieve wealth and success because of building valuable new ventures – which is quadrant #1 in a two by two matrix of entrepreneur success and venture success. It is in principle possible that entrepreneurs may become wealthy but the new venture fails (quadrant #2), because of possible financial fraud by the entrepreneur. Likewise, it is possible that both entrepreneur and new venture fail (quadrant #3) and for the venture to succeed but the entrepreneur does not become wealth (quadrant #4).

To examine quadrant #2, we systematically searched online with search terms that included ‘fraud’, ‘court case’, ‘litigation’ to identify cases where the entrepreneur defrauded investors. However, this search yielded only a couple of cases. So it appears that overwhelmingly, the entrepreneurs in our sample were exerting good faith efforts. Quadrant #3 refers to a situation where neither venture nor entrepreneur was successful. We modelled this situation by focusing on a different sample of “almost successful” new ventures. By almost successful we mean new ventures that raised multiple rounds of venture capital funding but ultimately, the venture was not successful. We assembled this sample by identifying 120 “almost successful” entrepreneurs drawn from 72 “almost successful” ventures during this time period. We then coded the same data for this sample.
Unsurprisingly, most of the entrepreneurs in this sample transitioned to regular employment or to founding a new commercial venture subsequent to venture failure. We coded about 3% of this sample as having transitioned to social change efforts. In addition, it is possible that
the entrepreneur was not successful although the venture was successful (quadrant #4). This can happen in a situation where the entrepreneur’s equity stakes in the venture was diluted away by the investors, because of “down round” funding; alternatively this could be due to CEO replacement events. However, we were unable to estimate precise shareholding patterns and attribute accurately the equity stakes at exit held by the founders (as compared to the investors). Online media search revealed no instances of founders being forced out of their ventures during our study period. So we are unable to shed light on this issue.

DISCUSSION & CONCLUSION

We know very little about the drivers of new economic elites’ involvement in social change. In this study, we examined one population of new economic elites - successful commercial entrepreneurs - and modelled the likelihood of their involvement in social change efforts. We used the lens of imprinting to examine factors that might make some successful commercial entrepreneurs more likely to engage in social change. Our results suggest that successful commercial entrepreneurs who build more valuable ventures, experienced some higher education in developed economies, were older at the time of financial exit and are female are significantly more likely to get involved in social change efforts.

We note that our quantitative results are based on archival sources and we do not have primary data from the commercial entrepreneurs in our sample on how they spend their time and energy; neither do we observe the extent to which they engage in multiple other activities. Likewise, we do not have data on the early socialization of the entrepreneurs in our sample. This prevents us from accounting for initial imprinting effects of their early childhood or early adulthood experiences such as their first job, which could be correlated with the imprinting elements we examined in this study. Unfortunately, we currently do not have reliable data on the wealth that entrepreneurs accumulate at the exit event. This prevents us
from disentangling the different mechanisms at work that lead to some of our predictions. Furthermore we use a relatively novel methodology, whose bias is unknown, to infer whether a commercial entrepreneur is involved in social change activity.

Despite these limitations and the exploratory nature of our findings, to the best of our knowledge, this is the first study to systematically examine which successful commercial entrepreneurs get involved in social change efforts and link it to their exposure to achieved and ascribed imprinting elements. In doing so, we contribute to the literatures on elites and entrepreneurship.

**New economic elites and social change**

One strand of literature on elites postulates a theory of power elites (cf. Domhoff, 1979) and argues that the existing elite uses its wealth and other resources to control the polity and set up institutional logics that perpetuate the status quo. This stream of research has paid less attention to how ‘self-made’ men and women who become independently wealthy through commercial entrepreneurship can be engines of social change. Our results suggest that an important mechanism of social change could be through new economic elites who use their increased endowment of resources to engage in social change efforts.

**Link between Commercial and Social Enterprise**

As Zahra, Rawhouser, Bhawe, Neubaum and Hayton (2008) point out, social enterprise could be particularly important in emerging economies where access to basic resources is often highly unequal. Our findings imply that the economic arena in emerging economies makes some commercial entrepreneurs successful and hence wealthy. The few such successful entrepreneurs that go on to engage in social change efforts might be potentially important societal change agents. This is because such individuals have financial
resources to challenge vested interests, the human and social capital to build new organizations and have been imprinted in ways that make them prosocial in decision making.

Our focus on the link between successful commercial entrepreneurs and social entrepreneurship also adds to the literature on serial entrepreneurship (e.g. Sarasvathy, Menon and Kuechle, 2013) that treats the entrepreneur and the organization as distinct loci of analysis.

**Future research directions**

Our findings are a useful starting point for future research along several paths. First, a natural follow on research question is to examine whether commercial turned social entrepreneurs are more successful in making desired social change happen, in comparison to novices or even serial social entrepreneurs.

Second, it is not clear how these entrepreneurs select specific verticals or domains to enter. For instance it can be argued that domains for social entrepreneurship can be arrayed on a continuum on the extent to which they challenge powerful vested interests. Do social entrepreneurs from the population examined in this study systematically pick the domains with more powerful vested interests? Or do they pick the ones with less powerful vested interests? These are theoretically important because they provide clues on the extent to which the new economic elite is willing to challenge the status quo.

Third, we examined only subset of the new economic elite. Senior corporate executives and senior professionals in other occupations are another source of new economic elites. Do they get involved in social change in the same way? Do they target similar domains? Are they more or less successful than commercial entrepreneurs? These are important questions to consider.
Finally, it would be useful to examine whether our results generalize to other Asian emerging economies such as Indonesia or Bangladesh which are experiencing high economic growth and are slowly acquiring the building blocks of an entrepreneurial eco-system by adopting templates from the United States. These societies are at different stages of economic development and with different national institutions, so we should expect to see some interesting differences in how successful commercial entrepreneurs in these contexts transition into social change, which may help us further explore how new economic elites drive social change in emerging Asia.
REFERENCES


Smith, B. R., & Stevens, C. E. 2010. Different types of social entrepreneurship: The role of geography and embeddedness on the measurement and scaling of social value. Entrepreneurship and Regional Development, 22(6), 575-598.


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               ii. ‘social entrepreneurship’  
               iii. ‘social venture’  
               iv. ‘social movement’  
               v. ‘social change’  
               vi. ‘charity’  
               vii. ‘foundation’ |
| Step 2:      | “founder name + harvested venture name” | i. ‘government’  
               ii. ‘political’  
               iii. ‘politics’  
               iv. ‘political movement’  
               v. ‘political change’  
               vi. ‘political action’  
               vii. ‘civil society’ |
TABLE 2
Descriptive Statistics and Correlations^a

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^aN=665 observations; correlations above 0.08 are significant at 5% or better
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*Table reports logit analysis coefficients with t-statistics based on standard errors clustered around venture id in parentheses

† p < 0.10  * p < 0.05  ** p < 0.01  *** p < 0.001 (all two tailed tests)