Don't Turn a Blind Eye to ENVIRONMENTAL VIOLATIONS

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Many firms believe that the way to cope with environmental violations by their contract manufacturers is through greenwashing initiatives which they hope will protect them from collateral damage. Chris Lo, Christopher Tang, Paul Zhou, Andy Yeung, and Di Fan disagree, arguing that turning a blind eye to polluters in their supply chains can cause major problems for firms.

From Observing to Questioning

On March 23, 2008, a newspaper in Inner Mongolia reported that thirty-nine Chinese workers were exposed to hydrogen chloride, a poisonous gas, while working at a plant belonging to the Northeast Pharmaceutical Group. Founded in 1946 and based in Shenyang, the Northeast Pharmaceutical Group produces chemical synthetic and bio-fermented active pharmaceutical ingredients (APIs) for customers such as BASF Pharmaceutical. Incidents of this kind once fell on deaf ears in China due to inconsistent law enforcement, opaque business practices, and light penalties. However, when news of the incident was reported, the stock price of Northeast Pharmaceutical Group dropped by 2.03 percent on the Shanghai Stock Exchange while that of its customer BASF dropped by 1.05 percent on the Frankfurt Stock Exchange. Was this sudden drop a coincidence?

It used to be impossible to examine this sort of question rigorously because data about polluting plants in China were either nonexistent or inaccessible. However, the 2007 establishment of the Measures on Open Environmental Information (MOEI) by the Chinese government has enabled the Institute of Public and Environmental Affairs (IPE), a Beijing-based nonprofit, to collect data about environmental violations in China. The database developed by IPE has become a renowned source through which overseas buyers, multinational brands and NGOs could monitor the environmental performance of Chinese suppliers. As environmental incidents became more visible (Figures 1 and 2), we wondered if the stock market would respond negatively toward polluters like Northeast Pharmaceutical Group and toward overseas buyers such as BASF who choose to do business with these culprits.

Data Collection and Findings

Using the IPE's data from 2004 to 2013, we identified 1,833 environmental incidents involving 524 publicly listed manufacturing firms between 2004 and 2013. Given that 1,675 firms were listed in China in 2014, this number represents about 31 percent of manufacturers in China. We then tracked the date of the first public announcement of each violation, the identity of the manufacturer, the characteristics of the manufacturer (in terms of social recognition through the number of relevant awards won, percentage of government ownership according to the Thomson Reuters Eikon database, and political ties through current government position(s) held by its non-executive board members), and its stock price over the relevant time. Because some of these polluting Chinese manufacturers supply other firms, we identified their major overseas customers (according to annual reports), and then tracked those customers from the day before to the day after the public announcement of the violation.

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We found empirical evidence that the drop in the stock prices of Northeast and BASF was not a fluke. The share prices of Chinese manufacturers dropped an average 0.41 percent (adjusted for the performance of the stock market) in the two-day period surrounding the announcement of an environmental violation. Moreover, the top five overseas customers of those polluting Chinese manufacturers also saw their stock fall an average 1.13 percent (adjusted for their listing stock markets' performance).

We also found that greater social recognition (in terms of relevant awards won) can lessen the negative stock returns caused by environmental incidents. This effect is probably caused by the market's greater confidence that reputable firms will clean up their act. Higher government

Figure 1. A river polluted by dyed water from denim factories. Source: Chinatoday.com

ownership has a similar effect, probably because the market believes that strong financial and political backing will allow state owned enterprises to take corrective action. However, we also discovered that the market will react more negatively when the firm has more non-executive board members in government positions or executives with political ties.

Implications

Our research findings have different implications for different stakeholders:

1. **Implications for Chinese manufacturers.** Knowing how negatively the market will react to environmental violations, Chinese manufacturers should recognize a clear economic incentive to comply with environmental requirements and improve environmental performance.
2. **Implications for policymakers.** The Chinese government should continue to ensure the public access to firms' environmental information so that NGOs, overseas customers, and the Chinese public can join forces in monitoring their compliance with environmental regulations.

Chinese manufacturers are more likely to act responsibly if there is a carrot, as well as a stick.

3. **Implications for NGOs.** Besides acting as enforcers, some NGOs, such as Greenpeace, the World Wildlife Fund (WWF), and IPE, could independently endorse firms with strong environmental performance. Chinese manufacturers are more likely to act responsibly if there is a carrot, as well as a stick. At the same time, NGOs should continue to educate the public about how air and water pollution can affect them and their descendants and about how they can help to monitor and report environmental violations.
4. **Implications for investors.** Because environmental violations committed by Chinese suppliers have a negative effect on both the suppliers and their overseas customers, investors should focus more on the environmental performance (as well as the social recognition, government ownership, and political ties) of all partners along the supply chain, not just of the firm they invest in.
5. **Implications for consumers.** As consumers gain ever increasing access to environmental information about firms, whether directly through Chinese government websites or through other online databases, they become ever more able to monitor and report environmental violations. More importantly, they can use social media to expose bad deeds and use their purchasing power to pressure overseas companies to take action to ensure their Chinese suppliers' compliance with environmental regulations.

Now that the Chinese government is improving public access to information about the environmental performance of Chinese firms and imposing harsher punishments for violations, it's time for everyone to come clean.

Figure 2. Air pollution caused by coal power plants. Source: BBC China

When choosing a Chinese supplier, overseas customers should evaluate and monitor their environmental sustainability and social responsibility, not just their operational performance. Turning a blind eye to these concerns can create major problems when suppliers violate environmental regulations. Under China's revised environmental protection law enacted in 2014, all firms operating in China are required to disclose their environmental information. Furthermore, in 2013 President Xi Jinping declared war on environmental pollution, so enterprises are now subject to more

severe penalties for polluting the environment. Now that the Chinese government is improving public access to information about the environmental performance of Chinese firms and imposing harsher punishments for violations, it's time for everyone to come clean. ■

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