

Improvement of Safety Performance Indicators utilizing Safety Communication Tools

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1. Introduction

As Lafarge Halla Cement Corp.(LHCC) has the huge area and the biggest capacity, there were lots of risky factors surrounding the plant and possibility of accidents. In addition to it, the management and employees was not motivated so successfully and the safety performance was not good. Before Lafarge acquired it. Since then, the huge changes in terms of safety and safety awareness came up to the horizon.

To enhance a safety performance, it had invested a lot and introduced new systems. Despite a proactive investments for safety and efforts, there were 6 fatalities during the period from the year 2000 to 2002. However, there was a positive result in LTI.

In this situation, the safety campaign was a trial of different approach and is the most successful way for safety. So, the safety systems and procedures was not enough to get a good performance. Without an involvement and changing their awareness, the goal of safety can not be reached. For this, the company started the two programs; one is the Safety Campaign and the other is Safety Communication Session.

2. Objectives

LHCC became known to Cement Division that the biggest and the hardest BU. Quarry is located at mountain area, 700 meters above sea level. The distance between main plant and quarry is 9 kilometers. Harbor plant is 4.3 kilometers away from the main plant.

The broad outline of the LHCC are as follows.

- Production : CLK 8.25 mil. tons

P/C 7.40 mil. tons

S/C 0.75 mil. tons

- 3 Plants and 17 sales offices

Despite safety investments and efforts were still being carried out continuously to promote a safe work environment.

LHCC health & safety management was not easy to accomplish accident-free. After analysis of previous accidents, we found that there was communication problem not only within LHCC organization but also with contractors. As a result, our safety campaign objectives are to share and common safety target and to make a real contribution on safety performance in the day-to-day work through communication.

The campaigns mainly focused on following targets.

- 1) To accomplish accident-free targets
 - Fatalities '0
 - Lost Time Injuries '0'
- 2) To change all employees' mind-set
- 3) To inspire safety awareness

The basic principles for the campaign were as follows.

- 1) Cross-functional cooperation among Labor union, Health & Safety and Communication
- 2) Direct participation from the LHCC employees and contractors
- 3) To make them feel a sense of safety in a daily life and connect it to happiness with their families

3. Resources

3.1 Safety Communication Session

It was a very long-term project started from March 2003 and ended in September 2004. All employees and the subcontractors joined the education session to develop an effective communication ability for safety. With the Safety Communication Session, they started to understand an importance of communication between the management and workers and employees and subcontractors. This program was very successful and got a good reputation from employees. So, feed-back events escalated into their families including employees.

3.2 Safety Campaign

In the past, monthly safety campaigns usually ended after a one-time promotion

phase. To overcome this problem, LHCC started a safety campaign on the principle that we will perform viable campaigns continuously until employees fully understand the safety issues. This means that quarterly safety campaign is more effective and efficient than monthly safety campaign. Therefore, LHCC safety campaigns were performed on the basis of quarter (Table 1). To implement a successful program, we divided the campaign into four stages including planning, meeting, training and implementation.

Table 1 Theme of Safety Campaign

Description	Title	Object
1st	Work at height	Safety work at height
2nd	Near Miss	Active near-miss reporting and utilize them to improve on-site activities
3rd	Transportation	Promote vehicle safety awareness including forklift and industrial trucks, etc
4th	Going-together partners	Establish a mutual working culture between LHCC and contractors
5th	LOTO	Prevention of human errors in time of periodic maintenance of equipment

4. Results

Up to the present, we achieved good results thanks to the 2004 and 2005 safety campaigns. As you can see, our safety performance was dramatically improved compare than 3 years ago. As a result, we won the 3 prizes in national Health & Safety contests. We can share the safety best practices with Lafarge brothers and domestic companies.

4.1 Safety performance & Mindset change

We not only achieved a fatality rate of zero but a Frequency Rate including contractors that was below the Cement Division target of 1.50. What is the most important thing is that our employees and contractors have changed their minds step by step.

4.2 Reward

As a result of the above efforts, LHCC was awarded 1st prize for best Health & Safety Management by the Ministry of Labor on July 1st, 2004. The prize was a first for the cement manufacturing industry in Korea and as a result LHCC will be

exempt from government safety inspections over the next two years.

Soon after, LHCC was awarded 2nd prize from the 2004 Korea Safety Awards that was organized by the Ministry of Government Administration and Home Affairs. The award was the result of a zero accidental fire record, competent self-firefighting abilities and emergency preparedness.

4.3 Sharing of Experience

LHCC shared its safety experiences with other major domestic cement companies. Major steel manufacturers were also given information about the successful safety campaigns in Korea.

LHCC usually meet Lafarge Plasterboard Korea(LPK) every half of the year through the Korea Safety Network. The LHCC Communication team will continue to support external Safety Networks and work together to ensure strong safety records for other companies and neighbors.

References

- [1] Stetzer, Adam, The influence of managerial safety practices and defensive communication climate on accident attributions, PH.D Purdue University, 1996.
- [2] Goldberg, Edward Michael, The effect of leader communication style on safety-conscious work domestic nuclear power plants, D.M. University of Phoenix, 2003.
- [3] Schneider, Mitch, Safety Communication, Tomson Learning, 2003.
- [4] Communication in Road Safety, Renouf Publishing Co Ltd, 1997.
- [5] LHCC, Safety Communication, 2004.