# Glaxosmithkline (gsk) - successful internal innovation



Based on GSK's past performance, what do you believe are the critical implementation issues for GSK with regards to internal innovation? Justify your answer.

Based on GSK's past performance the critical issues to internal innovation include

#### 1. Managing radical structural change

GlaxoSmithKline (GSK) restructured its R&D efforts into Centers of Excellence for Drug Development (CEDD that focuses on eight therapy areasbiopharmaceuticals, immuno-inflammation, infectious diseases, metabolic pathways, neuroscience, oncology, ophthalmology, and respiratory. To address these areas, the firm in 2008 created 70 Discovery Performance Units (DPUs). Following GSK's restructuring, more than 35 percent of discovery projects have been terminated in 2008. The efficient management of the firm's structural change is critical to GSK's internal innovation efforts.

#### 2. Developing a pipeline of new products

To be consistent with its goal, GSK spent over 10 percent of its revenues on R&D in 2008. Although GSK made 21 new drug discoveries in the fiscal year 2008, there is always a danger that a competing firm may enter the market with a similar product first. There is a risk of failure and therefore a need to develop the right product at the right time.

#### **3. Protecting Patents**

Patent expiration is a major problem facing GSK and other companies. GSK has 30 patented drugs in the late stages of patent protection.

With the 70 DPUs working on eight therapy areas for future growth of the company, how might this affect the implementation effort and would the firm need special programs to ensure that implementation was successful?

With the 70 DPUs working on eight therapy areas for future growth, the implementation challenges require special programs for successful implementation

#### Need for adequate funding of DPUs

Following the restructuring of GSK in 2008, the DPUs were given three year funding guarantees. The guarantee of funds helps the R&D groups focus on best science and delivering the best product for consumers in hard timelines to generate marketable products. To sustain future growth of the company, a continuous funding program for DPUs is essential.

## Need for knowledge management systems for information sharing across DPUs

A strong knowledge base of ideas products and processes in pipeline will ensure feasibility of ideas at an early stage and also avoid duplication of efforts. The firm should ensure sharing of knowledge within DPUs through efficient knowledge management systems. Technical reports maybe electronically archived. Information technology systems may be efficiently utilised to store and disseminate information across DPUs and cross functional teams. A vision for where the organisation and the team are going.

#### Need for efficient co-ordination within the DPUs

The DPUs within the 8 therapy areas have responsibilities for a small part of the pipeline associated with the production of a drug. The firm's management should ensure smooth and efficient co-ordination between DPUs and cross functional teams to manage competition of resources potential opposition and complacency during innovation efforts.

#### Need to reinforce organisational culture across DPUs

The DPUs are fully empowered, compact, focused and integrated teams. To achieve GSK's primary focus, the management should ensure alignment of internal culture in DPUs with the overall organisational culture. A vision for where the organisation and the DPUs are headed is essential for driving innovation efforts. Organisations successful in making the employees feel like family or imbuing a sense of belonging in the employees usually score higher on innovation

### Need to drive innovation through employee focus within DPUs

To create goal directed communities, the top management at GSK can set objectives for the employees but the means to achieve the objectives are decided by the employees themselves. To help enhance innovativeness, GSK should ensure balanced autonomy, a proper integration of technical skills and teamwork, and personalised recognition/reward systems.

What are the special evaluation needs for a company such as GSK, with regards to its internal innovation? What characteristics of GSK do you believe

have the most influence on how well GSK evaluates progress toward stated innovation goals?

A company such as GSK necessitates special evaluation criteria as listed below to manage internal innovations. However, some of GSKs characteristics favor progress towards its innovation goals.

# **1.** Goals and objectives – Do innovations fit with company's primary focus?

GSK's extensive internal development efforts often lead to innovations that do not adhere to the company's primary focus. GSK develops external discovery teams with other firms, universities or research labs. Thus, GSK strives to maintain its focus on its own strategic goals and its eight primary areas of research for innovations.

#### 2. Policies – Do the policies drive and support innovation?

GSK screens approximately 65 million compounds annually in search of new pharmaceuticals to cure the diseases focused on. The firm has the culture and the processes that support innovation. In 2008, approximately 75 percent of new products in the pipeline were entirely new compounds/vaccines.

### **3.** Resources and capabilities – How and where are resources and capabilities allocated?

GSK has a disciplined approach to how and where resources are allocated within R&D. More than 35 percent of discovery projects have been terminated following the reorganisation in 2008. After the elimination of these projects, the DPUs were given three year funding guarantees.

#### 4. Value Creation – Are we creating value in the market?

GSK has made a ground-breaking effort to provide HIV/ AIDS drugs in developing countries at significant price reductions and has made other treatments available at reduced prices to people in the poorest countries of the world. GSK is focused on delivering best science and best products.

# 5. Competitiveness and Profitability – What products are marketable and generate revenue?

GSK is redefining its portfolio of products. GSK is concentrating its R&D on developing a higher volume of mid-size products in particular patient populations. This will lower the risk of the portfolio of drugs because the revenues of the firm will not be dependent on one or two major successes.

### 6. Best practices – Are best practices being followed to aid knowledge sharing and maximise performance?

GSK has cross functional teams within R&D and encourages cross fertilisation of ideas to support knowledge sharing and to create a strong knowledge base. The R&D unit consists of cross-functional teams that include scientists, marketing specialists, and others from key domains in the business working on innovations. GSK encourages cross-fertilisation of ideas through alliances and meetings among its own scientists where different compounds and potential products are showcased. In these settings, R&D groups of individuals gather and learn about new products and processes.

7. Evaluation system - Are we pursuing the right ideas, products?

There is a need for a process to evaluate the different ideas and products so that judgments can be made on which innovations to initiate support for or to continue support of. The ability to justify the product at each step of the process is critical for the team promoting it.

8. Technology for Patent watch- How are we protecting our patents?

There is a need to employ technology that enables electronic patent watch and feeds information on competing firms patenting activities.

Identify and explain the kinds of control systems you suggest GSK employ to manage innovation? (9 marks)

#### **Cultural Control**

#### **Measuring performance**

An effective method of managing innovation would be through GSK's organisational culture. Organisations that make employees feel like family or instill a sense of belonging in the employees usually score higher on innovation as against those that use formal control methods. With 70 DPUs focused on innovation efforts, the top management sets the objectives for the employees but enable the employees with means to achieve the objectives themselves.

#### **Financial control**

#### **Measuring value**

GSK can evaluate the monetary value of its current R&D projects by calculating the net cash flows for two different time periods – from the start of the R&D project to its end, and from the start of the utilisation of the R&D outputs to the end of the forecasted economic life of the project.

#### **Measuring effectiveness**

To measure effectiveness, GSK needs to determine aspects in R&D that need to be measured with a proper measurement system. GSK should create a framework that considers the levels of effectiveness of the R&D function from level 0 to level 5 in ten different R&D activities.

#### **Strategic Controls**

#### **R&D** Audit

GSK can conduct an R&D audit to monitor and control its research and development activities. The R&D audit would typically cover issues such as alignment of R&D objectives with the overall objectives of the organisation, allocation of budgets, tracking expense, decisions on commercially unviable projects, coordination of R&D activities between DPUs and availability of necessary inputs and equipments.

#### **Balanced score card**

The integration of the balanced scorecard with the R&D activities starts with deciding the strategic indicators for GSK. GSK can select metrics to match its objectives.