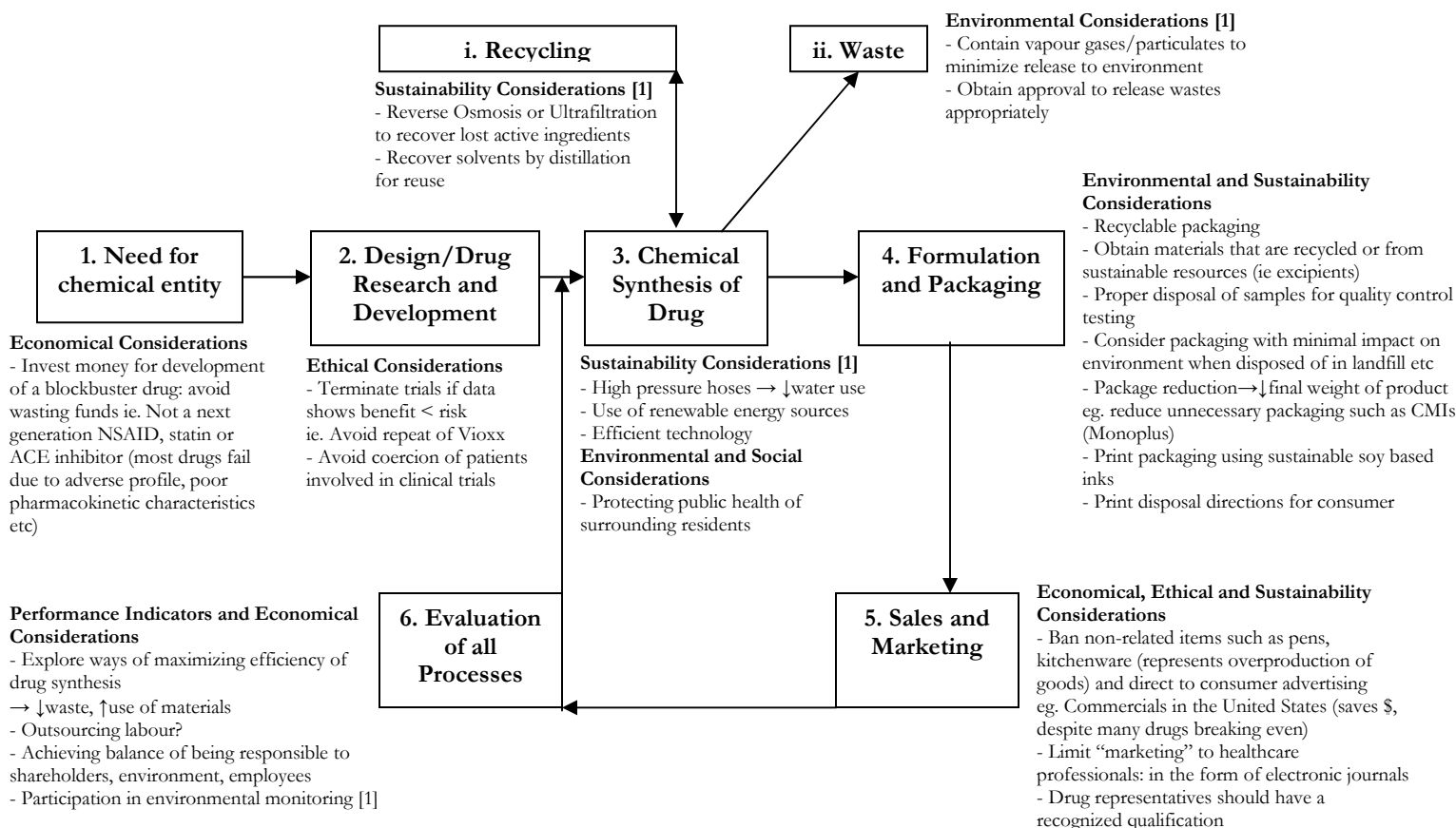


Roadmap of Manufacturing Important Pharmaceutical Product



Appendix - Additional Notes: Limitations

A limitation of the roadmap is that it may be difficult to distinguish the motives behind the pharmaceutical companies being environmentally friendly as they have often found it to be a good business practice in terms of cost [1].

Despite most drugs failing to reach the market, the roadmap may be viewed for an existing drug such as Lipitor. Pfizer has explored options of relocating atorvastatin manufacturing to China [2]. Whilst Pfizer is committed to corporate social responsibility [3], China’s development has long been considered unsustainable and irresponsible [4]. The Chinese government has shut down several drug factories due to common improper waste disposal practices [5]. Many shut downs occurred prior to the Beijing Olympics – however due to government censorship, the full scale of industrial pollution may not be known. Thus the roadmap does not clearly distinguish whether or not the manufacturer holds true to their commitments of sustainable development.

References

- [1] Berry, M., A., Rondinelli, D., A (2000) Environmental Management in the Pharmaceutical Industry: Integrating Corporate Responsibility and Business Strategy. *Environmental Quality Management*.
- [2] Tong, V (2008) Pfizer Execs Prepared to Cut Costs, Expand in China [Online] Accessed 30th of September from <http://www.manufacturing.net/article.aspx?id=155588>
- [3] Pfizer (2009) Corporate Social Responsibility [Online] Accessed 8th of October 2009 from <http://www.pfizer.com/responsibility/>
- [4] Chan, C., Koenig, C., Rjarthenam, S (2006) Beijing 2008: Greening the Games? University of Michigan. Pp. 1-21
- [5] China Internet Information Center (2007) China Targets Drug Firms in Pollution Crackdown [Online] Accessed 30th of September 2009 from http://en.china.cn/content/d80668,f04154,1424_4016.html