# Efficacy of Reusable Learning Objects (RLOs) in a Corporate Environment Jason Bell 3078931

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## **Abstract**

The exact definition and efficacy of learning objects is a subject of debate. Corporations may benefit from building a learning repository for training, if it is done well. A poorly planned and implemented ad hoc solution is unlikely to be effective. This paper briefly discusses these issues and how they should be considered.

Keywords: Corporate, RLO, Reusable Learning Object, Repository

# Introduction

The term "Learning Object" was coined by Wayne Hodgins in 1994 [1]. The definition of this term is vague and poorly defined. For example, the Institute of Electrical and Electronics Engineers uses the definition "any entity, digital or non-digital, that may be used for learning, education, or training" [2]. Clearly this applies the definition to any resource, whether a textbook, websites, reference materials, lectures, tutors, or journal papers; rendering this definition meaningless.

A narrower definition of learning objects describes them as "any digital resource that can be used to support learning" [3]. However, this is still a broad definition: are aggregates of websites such as Wikipedia pages and technical documentation, such as using Oracle reference documentation for learning Java, acceptable learning tools? How does the quality, or lack thereof, of these online resources affect their viability as learning objects? Will these sites make sense once presented together in the same context?

Robert Beck added these criteria to his definition of learning objects [4]:

- They are small, representing 2-15 minutes of learning.
- Each object can be presented independently.
- They are reusable in different contexts.
- They can be aggregated into larger collections.

- Have metadata descriptions to facilitate searches.

Clearly, an exact definition for the term "learning object" has not been accepted universally.

#### Discussion

It is not difficult to see why RLOs would be appealing for corporate training: anything that can be reused, lowers cost. Rather than constantly rewrite or reorganize training materials, it would be appealing to organize them into a searchable repository. When a new employee is training, they can simply search the repository for any learning objects that are tagged with keywords of interest. If the learning objects are aggregated, such that one learning objects lead to other, related learning objects, there are further opportunities to learn.

If the learning objects are designed with explicit learning objectives, they can be used to assess how well the trainee learned the material. After the training is complete, a corporation can present the trainee with an examination made up of those learning objectives as questions. Any questions which the trainee fairs poorly on show which learning objects the trainee needs more work on.

One potential disadvantage of learning objects which may be of concern to corporations is their efficacy if improperly implemented. As was asked in the introduction, is collecting a diverse array of online resources, lumping them together, and presenting them in the same context, a valuable way to train? Will the inconsistent and conflicting standards, style, and contexts of such websites hinder learning? My own experience with such learning objects in a few Athabasca University courses suggests that it most certainly will.

This leads to a second disadvantage that corporations must consider: setup cost. If a corporation wishes to have a high quality and useful learning object repository, those learning objects should be carefully selected and crafted by experts. Even if each is meant to be able to stand on its own, they should be consistent in style, and designed in such a way that they make sense if aggregated into the same context.

Therefore, the stakeholders must be convinced that the cost of doing so will be worth it in the long run. Even if it is a one-time cost, it is still a cost. It would be up to the decision makers to decide whether that cost is worthwhile given the current financial situation.

It is noteworthy that reviewing the literature shows that while there is much evidence of interest in learning objects by academia, there is not much to be found of corporate success stories. This is partly sampling bias: academia by its nature will make up far more literature than corporate sources. However, while searching, I found a lot of evidence of people proposing their use in and advantages for corporations, and very little actual evidence of use. I am unsure whether this is evidence that corporations are not using learning objects, or treat them as proprietary intellectual property and not available for public consumption.

### Conclusion

The decision of whether to adopt learning objects has pros and cons that must be carefully considered. If poorly implemented, they are likely to be an inferior tool for training, compared to traditional techniques. An ad hoc repository of disparate resources, lacking any kind of standardization or consistency will be a frustrating training tool, rather than a helpful one.

If a corporation is willing to make the one-time expense in time and money of implementing a high quality, expertly designed and written, consistent, and standardized learning object repository, it is surely worthwhile. Once past that initial investment, the learning objects are available for reuse in perpetuity.

## Citations

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