Early Childhood Intensive Education Programs in Special Education: A Review of Studies on the Learning Experiences and Alternative Program (LEAP)

Abstract

The aim of this study was to analyse the research findings about effectiveness of the Learning Experiences and Alternative Program for Preschoolers and Their Parents (LEAP) and its components which applied on the children with autistic spectrum disorders (ASD) in early childhood. Studies in the special education literature in order to examine the effectiveness of LEAP research purposes, subjects, and findings were summarized. Summaries are given under the headings which were formed with the basic components of LEAP. At the end of each part, studies about the headings contrasted with each others and interpreted. As a result, although some of the controversial aspects of the effectiveness of LEAP and its components, experimental studies of the effectiveness of LEAP and its components showed that LEAP and its components are effective application for children with ASD in early childhood.

Key Words: Autistic spectrum disorders, application of special education in early childhood, learning with experience.
Structured Abstract

Introduction

The aim of this study was to analyse the research findings about effectiveness of the Learning Experiences and Alternative Program for Preschoolers and Their Parents (LEAP) and its components which applied on the children with autistic spectrum disorders (ASD) in early childhood. Therefore, in this article, firstly the characteristics of LEAP was summarized, secondly components of LEAP was expressed and finally, researches and its findings about LEAP was examined and analysed.

In the special education literature, LEAP, in terms of its some features, differentiates from other programs for children with ASD. These features are such that (a) inclusion, (b) intensively family training (at least 15 hours in week), to give some tasks for family members at the different stage of LEAP practice, in addition of them children with disabilities were improved by one-to-one education. At the same time, LEAP is not program for only children with ASD like Early Autism Program. LEAP was administered various disabilities which children have.

Differentiated characteristics of LEAP from other programs shown Table 1. Preschool classes of LEAP consist of participating 3-4 children with ASD and 8-10 children who normally develop. In the preschool classes of LEAP, generally, preschool teachers and early childhood special education teachers study with children. However, in the LEAP classes, there are 3 experts who works with children such as preschool teachers, early childhood special education teacher, speech and language therapist, occupational therapist and assistant teachers.

Table 1. Characteristics of LEAP

<table>
<thead>
<tr>
<th>Emphasis of Program</th>
<th>Application Environment</th>
<th>Weekly Hours</th>
<th>Inclusion</th>
<th>Teacher/Student</th>
<th>One-to-One Education</th>
<th>Family Training</th>
</tr>
</thead>
<tbody>
<tr>
<td>Typical Preschool Program</td>
<td>Institution + Home</td>
<td>15</td>
<td>+</td>
<td>3:6:10</td>
<td>+</td>
<td>+</td>
</tr>
</tbody>
</table>

Application model of LEAP is based on interdisciplinary model in order to improve the generalization of acquired skills within LEAP to another environment. In the LEAP application, family training programs are conducted by experienced another family about LEAP (Harris ve Handleman, 2006). This feature of LEAP are similar to the application of support groups in which families of children with disabilities perform.

Strain and Hoyson (2000) are briefly summarized the basic features of LEAP such as LEAP is (a) an individualized program, (b) guided by data, (c) to focus on the generalization, (d) to maximize the instructional facilities, and (e) to focus on teaching skills to the families. In addition of these features LEAP have some components such as (a) peer-mediated instruction, (b) errorless instruction methods, (c) pivotal responses teaching, (d) the picture exchange communication system, and (e) incidental teaching.

Studies on LEAP and Its Components

In the literature, there was 42 articles about LEAP, its components and related subjects. However, in this study, the researcher found 19 articles from the all of them. Research purposes, subjects, and findings of these studies which researcher found in the special education literature were summarized in order to examine the effectiveness of LEAP. Summaries are given under the headings which were formed with the basic components of LEAP. These basic components of LEAP is (a) efficacy of peer mediated social intervention, (b) efficacy of peer mediated communication intervention, (c) efficacy of instructional tactics on preacademic behaviors, and (d) efficacy of parent participation component. The researcher attained the nine articles about efficacy of peer mediated social intervention ((Lefebvre ve Strain, 1989; Kohler, Strain, Maretsky ve DeCesare, 1990; Kohler, Strain ve Shearer, 1992; Kohler, Strain, Hoyson, Davis, Donina ve Rapp, 1995; Odom, Hoyson, Jamieson ve Strain, 1985; Sainato, Goldstein ve Strain, 1992; Storey, Smith ve Strain, 1993; Strain ve Danko, 1995; Strain ve Hoyson, 2000). About second component of LEAP is an efficacy of peer mediated communication intervention, the researchers attained the third articles (Golstein ve Cisar, 1992; Goldstein, Kaczmarek, Pennington ve Shafer, 1992; Goldstein ve Wickstrom, 1986). The researcher attained the third articles about efficacy of instructional tactics on preacademic behaviors (Sainato, Strain, Lefebvre ve Rapp, 1987; Sainato, Strain, Lefebvre ve Rapp, 1990; Venn, Wolery, Morris, DeCesare ve Cuffs, 1993). The researcher did not attain any articles about efficacy of parent participation component. At the end of each part, studies about the headings constrained with each others and interpreted.

Results

As a result, although some of the controversial aspects of the effectiveness of LEAP and its components, experimental studies of the effectiveness of LEAP and its components showed that LEAP and its components are effective application for children with ASD in early childhood.