About UPSTART: Background

- Children in Utah were coming to Kindergarten unprepared to learn.
- At the same time, parents had repeatedly signaled an unwillingness to send very young children to school.
- Even if parents and caregivers had been willing to send their young children to school, in Utah’s rural areas, transportation presented a huge obstacle to overcome.
- UPSTART was designed to solve this problem.
UPSTART: The Pilot

- UPSTART was established by the Utah Legislature as a five-year pilot to address Utah’s kindergarten preparedness problem.
- Because legislators were not sure it would work, or if families would even be interested in the program, they set up the pilot with strong reporting requirements and an even stronger external evaluation component.
- After the UPSTART legislation was passed, the Utah State Office of Education oversaw an RFP process, and the non-profit Waterford Institute was selected to administer the UPSTART program working with the Utah legislature and the Utah State Office of Education.
- UPSTART is finishing its fifth year and Utah SB 148 (2014) renewed the pilot for five years and increased funding.
About UPSTART: The Program

- UPSTART is an in-home school-readiness program that uses Waterford Institute’s award-winning software.
- Preschool-age children receive an individualized reading, math and science curriculum with an emphasis on reading.
- UPSTART forms a partnership with parents and caregivers to ensure all children obtain the education necessary for success in school.
- Computers and internet are provided if the home does not have them.
Educational Software Package

Waterford Assessments of Core Skills™ (WACS) adaptive computer-administered test

Rusty and Rosy Learn with Me™ adaptive and sequenced core curriculum

Camp Consonant™ multisensory tutoring software
Rusty and Rosy Learn with Me

- Sequenced to provide individualized learning
- 2,500 + lessons
- 7,000 + activities
- 360 digital books
- 330 animated songs
- More than 450 instructional hours
- Hundreds of printable resources
- Progress reports
Reading – Pre-Assessment
Reading – Instruction
Math – Introductory Song
Correlations

- 100% – Head Start Child Outcomes Framework
- 100% – NAEYC’s Guidelines for Curriculum Content
- 100% – Primary Literacy Standards for Reading and Writing
- 99% - 100% – Various state correlations
Camp Consonant

- Over 2,700 individual activities
- More than 150 hours of instruction
- Books, songs and videos
- A built-in system of reinforcement that rewards children’s efforts
Waterford Assessments of Core Skills

- Based on five years of research and aligned to both national and state standards
- Children are screened two times during the year at specified, controlled locations
- Children are screened in ten key pre-literacy and reading skills
- Support staff and parents are provided with a full range of a child’s capabilities rather than just a satisfactory or unsatisfactory assessment
Waterford Assessments of Core Skills
UPSTART’s Unique User Support

UPSTART’s dual-language support organization maintains frequent proactive contact through

- Written materials
- In-person and online training
- Emails providing support and ideas for offline activities that parents can do to help prepare their children for school
- Motivational phone calls

This support system forms a partnership with parents to ensure children get the most from the program’s learning opportunities.
Life of an UPSTART Participant: Registration

- Pre-register through the UPSTART website, fax or phone
- Lead maintenance
- Registration
  - Participant information
  - Usage and willingness to commit
  - Agreements
  - Qualify for computer on loan
Life of an UPSTART Participant: Training

- In Utah, we have 70 or more trainings throughout the state
- The WACS initial assessment is given
- We conduct parent training
  - Building value
  - Software overview
  - The all important 15/5 and establishing a routine
  - Participant agreement
- We also distribute equipment and Internet
Life of an UPSTART Participant: Usage Management

- Internet and technical support
- Welcome call
- Weekly e-mails
- Usage contests and activities
- Camp Consonant review
- Weekly/monthly usage review and motivational support
- Monthly medals
Life of an UPSTART Participant: Graduation

- In Utah, we have 70 or more locations throughout the state
- We give the final WACS assessment
- Distribute a Parent Satisfaction Survey
- Honor the accomplishments of all our participants
- Collect equipment
Community Outreach

**Government Agencies and Nonprofits**
- Health Departments of South Eastern Utah: Price, Moab, Blanding, Monticello
- Children’s Justice Center of Price
- Centro Hispano of Utah County
- Latinos in Action
- Centro de la Familia de Utah Honeyville, Genola, Centerfield, Providence
- Mountainland Head Start
- Bear River Head
- SUU Head Start
- Richfield Head Start
- Panguitch Head Start
- Kanab Head Start
- Delta Early Childhood
- UVU Weecare Program
- Housing Authority of Price
- United Way of Eastern Utah
- Hser Ner Moo Refugee Community Center
- Sunnyvale Refugee Community Center
- Castle Valley Center Price
- Comunidades Unidas
- Centro Cívico Mexicano
- YCC of Ogden

**Public Libraries**
- Beaver City Library
- Castle Dale Library
- Delta City Library
- Huntington City Library
- Minersville Library
- Orangeville Library
- Price City Library
- Provo City Library
- Springdale Library

**Religious Organizations**
- St. Peter and Paul Catholic Church West Valley
- St. Mary Catholic Church Park City
- St. Joseph Catholic Church Ogden
- Catholic Diocese of Utah

**Mexican Grocery Stores**
- Acapulco Market
- Campos Market
- La Diana
- Rancho Market
- Viva Markets

**Newspaper Ads Placed**
- Beaver District– Spectrum
- Carbon District– Sun Advocate

- Daggett District– Vernal Express
- Emery District– Emery County Progress
- Garfield District– St. George Spectrum
- Juab District– Times Nephi News
- Kane District– St. George Spectrum
- Millard District– Millard County Chronicle
- North Sanpete District– Sanpete Messenger
- North Summit District– The Wasatch Wave
- Park City District– The Wasatch Wave
- Piute District– Richfield Reaper
- South Sanpete District– Sanpete Messenger
- South Summit District– The Wasatch Wave
- Tintic District– Tintic Newsletter
- Wasatch District– The Wasatch Wave
- Wayne District– Wayne County Insider

- 27 visits to local school districts and elementary schools
- Mail and telephone contact with 108 rural elementary schools
Measuring Results

- Usage is a key indicator of results and tells if parents are engaged in motivating their children. Software usage is tracked for each child and reported on a weekly basis.

- Waterford Assessments of Core Skills gives a pre-program baseline and a past-program evaluation.

- The external evaluator for the program uses a treatment and control model to evaluate the program.

- Finally, parents’ feedback about the program and how to make it better is extremely important for planning.
Utah Results—Usage

- Consistent usage is key to each UPSTART child’s success.
- UPSTART aims for 75 minutes of weekly usage (15 minutes a day, 5 days a week).
- Average usage for year four was 107 minutes per week.
Year 4 Usage

Upstart Average Weekly Usage

- Overall Avg
- Recommended Avg

Week Begin Date (Monday)

Average Weekly Minutes

- 70
- 80
- 90
- 100
- 110
- 120

- 89.9
- 92.07
- 96.67
- 99.33
- 101.22
- 102.69
- 105.32
- 106.7
- 109.74
- 111.31
- 111.46
- 112.15
- 115.56
- 113.38
- 112.48
- 111.56
- 109.96
- 107.97
- 105.96
- 102.05
- 105.06
- 103.32
- 106.46
- 113.11
- 115.34
- 111.04
- 112.32
- 113.98
- 112.71
- 111.71
- 112.86
- 113.22
- 114.38
- 109.52
- 102.51
- 104.04
- 113.39
- 98.9

UPSTART
United: Preparing Students Today for A Rewarding tomorrow

Waterford Institute
Summary of Key WACS Results

- The average child in UPSTART entered kindergarten reading at the Kindergarten Advance level.
- Gains were greater for low-income children and for children not attending other preschool.
- Overall gains were not significantly different regardless of ethnicity, socio-economic status, parent education level, or geographic locale, indicating all children benefited from the program.
WACS Reading Score Gains Grouped by Ethnicity

- Asian/Pacific Islander (N=11) +547
- Caucasian (N=818) +428
- Hispanic (N=187) +517

Before UPSTART  After UPSTART
WACS Reading Score Gains
Grouped by Other Preschool Attendance

Before UPSTART  After UPSTART

Other Preschool (N=462)
No Other Preschool (N=588)
WACS Reading Score Gains Grouped by SES

Before UPSTART | After UPSTART

Below 200% Poverty (N=645)

Above 200% Poverty (N=405)

+523
+550
<table>
<thead>
<tr>
<th>Measured Individual Skill</th>
<th>Final WACS Score</th>
<th>Grade Equivalent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Letter Recognition</td>
<td>2082</td>
<td>K Beginning*</td>
</tr>
<tr>
<td>Letter Sound</td>
<td>2715</td>
<td>K Advanced</td>
</tr>
<tr>
<td>Initial Sound</td>
<td>2618</td>
<td>K Intermediate</td>
</tr>
<tr>
<td>Blending</td>
<td>2847</td>
<td>K Advanced</td>
</tr>
<tr>
<td>Listening Comprehension</td>
<td>2759</td>
<td>K Advanced</td>
</tr>
<tr>
<td>Non Words</td>
<td>3597</td>
<td>1&lt;sup&gt;st&lt;/sup&gt; Intermediate</td>
</tr>
<tr>
<td>Sight Words</td>
<td>3240</td>
<td>1&lt;sup&gt;st&lt;/sup&gt; Beginning</td>
</tr>
<tr>
<td>Real Words</td>
<td>3453</td>
<td>1&lt;sup&gt;st&lt;/sup&gt; Intermediate</td>
</tr>
<tr>
<td>Reading Comprehension</td>
<td>3019</td>
<td>1&lt;sup&gt;st&lt;/sup&gt; Beginning</td>
</tr>
<tr>
<td>Vocabulary</td>
<td>2883</td>
<td>K Advanced</td>
</tr>
</tbody>
</table>

*Kindergarten Beginning is the ceiling for Letter Recognition*
<table>
<thead>
<tr>
<th>Percentage</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>972</td>
<td>Utah parents and caregivers in year 4 voluntarily completed program evaluations</td>
</tr>
<tr>
<td>99.3%</td>
<td>felt UPSTART helped prepare their child for kindergarten</td>
</tr>
<tr>
<td>99.8%</td>
<td>said participating in UPSTART was beneficial</td>
</tr>
<tr>
<td>99.4%</td>
<td>would recommend the program to family and friends</td>
</tr>
<tr>
<td>98.6%</td>
<td>felt the content was appropriate for their child’s age</td>
</tr>
<tr>
<td>98.2%</td>
<td>felt that the children enjoyed the software</td>
</tr>
</tbody>
</table>
What Parents are Saying
UPSTART Year 4 Results

- The evaluation of UPSTART’s fourth year of implementation used a pretest-posttest control group design to assess the program’s impact on developing children’s early literacy skills in preschool. Other objectives included documenting the extent to which participants used the computerized curriculum; establishing the relationship between curriculum usage and literacy outcomes; and the degree to which the participants met the program’s curriculum usage criteria.

- Two hundred and twenty children were measured on two tests of early literacy skills: the Brigance Inventory of Early Development and the Bader Reading and Language Assessment. Differences in the development of literacy skills between a sample of UPSTART participants (the treatment group) and a group of similar nonparticipants (the control group) in the year prior to enrollment in kindergarten were examined.
Year 4 Results (cont.)

Brigance Growth Score Results

Growth rates were significantly different between the treatment and control group for the overall Brigance and four subtests. All of these differences in growth rates favored the UPSTART Treatment group. On average, the UPSTART participants scored 29 points higher on the Brigance posttest. The study reported an effect size estimated to be .37 for Total Brigance and .59 on the Basic Vocabulary subtest, which was the strongest subtest result. Figure 1 uses bar charts to compare the growth rates of the UPSTART treatment and control group as measured by the Total Brigance and each of its subtests from pretest to posttest for the matched samples.
Bader Growth Score Results

The UPSTART group showed significantly stronger growth rates relative to the control group on the Total Bader and two of the three Bader subtests as well. Figure 2 uses bar charts to compare the growth rates of the treatment and control group as measured by the Total Bader and each of its subtests from pretest to posttest for the matched samples. The study reported a .52 effect size for the Total Bader.
Year 4 External Evaluation—Overall

“Based on the…results, the evidence suggests that UPSTART’s use of education technology in a home based approach has considerable merit for facilitating the development of school readiness in young preschool children.”
"Super Vetting": the UPSTART i3 Grant

- On November 8, the U.S. Department of Education announced the results of the fourth round of the Investing in Innovation (i3) competition. Waterford’s UPSTART grant in the amount of $11.5 million was announced as one of the highest-rated applicants for a Validation Grant. The project is an expansion of the UPSTART program in Utah's 18 most rural school districts. The final award was made on December 23.

- The i3 grant program only awards Validation Grants to programs that have strong evidence of results. Altogether, i3 selected 25 grantees from 618 applications. Previous i3 grant recipients have included: WestEd; Teach for America; KIPP Foundation; Johns Hopkins; and the Smithsonian.
Serving Rural Utah School Districts
1) The table reflects the Head Start Bureau estimate of $7,222 per child (Douglas J. Besharov, Justus A. Myers, and Jeffrey S. Morrow, “Cost Per Child for Early Childhood Education and Care,” August 31, 2007, p.3). Note: Besharov, Myers, and Morrow estimate the cost at $9,381 per child, but the table here represents the Bureau’s figure.

2) The National Institute for Early Education Research (NIEER) in 2002 estimated the cost of providing a preschool education at $8,700 per child (NIEER Website Fast Facts). Note: Besharov, Myers, and Morrow estimate the cost of a full-day pre-K program per child is $12,570.
Four Things to Remember about UPSTART

1. Children like the program and use it.
2. UPSTART works and this has been borne out by an external evaluation.
3. Parents give UPSTART the highest possible marks.
4. UPSTART is uniquely cost-effective.
UPSTART Advisory Committee

- Chuck Foster, American Indian Education Specialist, USOE
- Brenda Hales, Deputy Superintendent, USOE
- Tiffany Hall, K-12 Literacy Coordinator, USOE
- Bill Hulterstrom, President, United Way of Utah County
- Nancy Livingston, BYU Emeritus Faculty Member
- Joanne Milner, Education Partnership Coordinator for Salt Lake City Mayor Ralph Becker
UPSTART Advisory Committee

- Kathleen Petersen, Title I Director, Washington County School District
- Tami Pyfer, Education Director for Governor Gary Herbert
- Dale Smith, Associate Dean of Education, Family & Human Studies, and Social Work, Salt Lake Community College
- Cheryl Wright, Department of Family and Consumer Studies, University of Utah
- Dr. Dustin Heuston, ex officio, Waterford Institute
Questions?

Claudia Miner
claudiaminer@waterford.org

Haya Shamir
hayashamir@waterford.org