



## STANDARDIZATION OF UTILIZATION OF WEB 2.0 TECHNOLOGIES SCALE FOR HIGHER EDUCATION PROFESSIONALS

**H. Uma Maheswari**

Ph.D., Scholar, Dept. of Education, Manonmaniam Sundaranar University, Tirunelveli - 627 012, Tamil Nadu

**Dr G. Rexlin Jose**

Asst. Professor, Dept. of Education DD&CE, Manonmaniam Sundaranar University, Tirunelveli – 627 012, Tamil Nadu

**ABSTRACT** In recent times, technology has totally revolutionized the education system and as a result, new ideas, methods and practices have emerged to make the instruction more effective and meaningful. Information and Communication Technology (ICT) is fast loading towards a paperless society where information or data are electronically stored in a virtual cyberspace. Part of the responsibility of higher education professionals is to prepare students for entering the job market. Thus, higher education professionals must learn all they can to help their students be a success in the twenty-first century. So, the investigators decided to study the Utilization of Web2.0 Technologies among higher educational professionals. As there is no suitable tool available to carry out the said study, the investigators decided to develop and standardize the Utilization of Web2.0 Scale for higher Education Professionals in Tirunelveli District, Tamil Nadu.

**KEYWORDS :** Web 2.0 technologies, ICT, Higher Educational Professionals

### INTRODUCTION

This scale consists of 60 items. These items have been collected from the various sources like Experts in Technology, Teacher Educators, Books, Journals, Internet and so on. Items were planned to prepare under various dimensions viz., Knowledge organization and sharing, Text and image based tools, Audio and video tools, Multimodal production tools and Website creation tools.

### PILOT STUDY

The Utilization of Web2.0 scale was administered to a random sample of population for which the tools were constructed. The sample colleges were selected in such a way that one from arts and Science Colleges and another from colleges of education. 25 professionals were collected from each college. Thus the size for preliminary try out was taken as 50 in number. The collected scored with the help of a scoring key prepared by the investigator. In Utilization of Web2.0 scale positive type statements were evaluated using five point scale Strongly Agree(5), Agree(4), Neither Agree nor disagree(3), Disagree(4), Strongly Disagree(5) and negative type statements were evaluated reciprocally. The professionals were instructed to select the best option against the statement by marking a circle in the relevant column. The pilot study was conducted on 50 Higher Education Professionals to establish reliability and validity of the research tools used in this study.

**Table – 1 Positive and negative items in the Utilization of Web2.0 technologies scale**

Name of the Tool	Positive Items	Negative Items
Utilization of Web 2.0 scale	1-9, 11-23, 25-31, 33-41, 43-60	10, 24, 32, 42

### ITEM VALIDITY

Procedure of validating the items is given below. The row and the column of the table was assigned for number or respondent 1-50 and items were numbered 1-60 in the preliminary draft Utilization of Web2.0 scale of each responded were recorded in item wise table. The sum of the scores obtained by the entire respondent was calculated individually. The co-efficient of correlation between each item by all the scores of 60 items of each score was calculated using the following Pearson product moment formula. The validity for each item was tested. The item validity was calculated by finding the correlation between the total score and item score. The co- efficient of relation between each item by all the scores of items and each score was calculated using the Pearson's product moment formula,

The item validity corresponding to the items in the preliminary draft of Utilization of Web2.0 scale is equal to or greater than 0.20 were selected. The r-values of selected items are in the following table.

**Table – 2 Selected Items in Uma-Rex Utilization of Web2.0 Scale**

Item No.	r-Values	Selected Items
1	0.1231	NS
2	0.4125	S
3	0.4552	S
4	0.2234	S
5	0.4667	S
6	0.6796	S
7	0.1321	NS
8	0.1567	NS
9	0.4321	S
10	0.0412	NS
11	0.4531	S
12	0.2313	S
13	0.4432	S
14	0.2543	S
15	0.2351	S
16	0.4421	S
17	0.1271	NS
18	0.5098	S
19	0.5689	S
20	0.4431	S
21	0.5432	S
22	0.5431	S
23	0.7819	S
24	0.0321	NS
25	0.0543	NS
26	0.6321	S
27	0.0691	NS
28	0.4180	S
29	0.5875	S
30	0.5543	S
31	0.4190	S
32	0.1128	NS
33	0.1921	NS
34	0.4410	S
35	0.3874	S
36	0.1804	NS
37	0.6932	S
38	0.5198	S
39	0.6689	S
40	0.1843	NS
41	0.1213	NS
42	-0.1276	NS
43	0.1612	NS
44	0.1532	NS
45	0.5789	S
46	0.4321	S
47	0.3398	S

48	0.1532	NS
49	0.1654	NS
50	0.5210	S
51	0.4410	S
52	0.3311	S
53	0.3398	S
54	0.6621	S
55	0.6987	S
56	0.1198	NS
57	0.3189	S
58	0.4499	S
59	0.4987	S
60	0.1876	NS

Note: S - Selected Items  
NS - Items Not Selected

#### RELIABILITY

The items in the tool were divided into two equivalent halves such as first items and next items. And the two sets of scores were correlated by Split-half Correlation method. Co-efficient of the reliability of the test was estimated by Spearman Brown Prophecy formula. Thus the correlation co-efficient ( $r$ ) and reliability co-efficient ( $r^1$ ) were found to be 0.553 and 0.7121 respectively.

#### FRAMING OF FINAL DRAFT

The selected items were put in the final draft of the test which was neatly printed and administered to the target professionals to record their opinions. The final draft of Utilization of Web 2.0 Scale consists of 40 items. All the items in the final draft have positive items.

#### REFERENCES

1. Agarwal, P. (2006). Higher education in India: the need for a change. Indian Council For Research on International Economic Relations.
2. Alexander, B. (2006). Web 2.0: A New Wave of Innovation for Teaching and Learning?, Educause, Vol 41, no. 2, pp 32-44.
3. Sankhala, O.P.(2007). Research Methodology in Education. New Delhi: Adhyayan Publications.