

TECHNOPHOBIA AND TECHNOPHILIA TEST

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Technophobia is the fear or dislike of advanced [technology](#) or complex devices, especially [computers](#). Cyberphobia is a concept described as a [specific phobia](#) expressed as "an irrational fear of or aversion to computers" or more generally, a fear and/or inability to learn about new technologies (Bauer, 1997).

Technophilia refers generally to a strong [enthusiasm](#) for [technology](#), especially [new technologies](#) such as [personal computers](#), the [Internet](#), [mobile phones](#) and [home cinema](#).

The Technophobia and Technophilia Test is a 44-item psychometric test that adopts Likert-type forced choice 6-point scale. Scales are from 1-point "Never, very infrequently" to 6-points "Very frequently, always" or from 1-point "Very strongly disagree" to 6-points "Very strongly agree".

There are 4 factors (44 items) included into the Technophobia and Technophilia Test, namely: (1) The use of new technology at work (6 items); (2) Technology at workplace (5 items); (3) Technophilia (20 items); (4) Technophobia (13 items). Examples of statements that were incorporated within Technophobia and Technophilia Test: "Technology at my workplace simplifies communication at the workplace (virtual communication)" or "I have felt an irrational fear of new equipment or technology" or "Because new technology I have felt that I was forced to change my way of working" or "I have felt that I was forced to change my way of working".

THEORETICAL BACKGROUND

Technophobia is the fear of or anxiety about the effects of advanced technology. Although there are numerous interpretations of technophobia, they seem to become more complex as technology continues to evolve. Technophobia is generally used in the sense of not justified an irrational fear. [Cyberphobia](#) and is the opposite of [technophilia](#).

The technophile regards most or all technology positively, adopts new forms of technology enthusiastically and sees it as a means to improve life Technophiles enjoy using technology and focus on the egocentric benefits of technology rather than seeing the potential issues associated with using technology too frequently.

The notion of addiction is often negatively associated with technophilia, and describes technophiles who become too dependent on the forms of technology they possess (Richards, 2010). Also in our study a correlation between technophobia and thechnophilia was negative and statistically significant (N = 625; $r = -0.20$; $p < 0.05$).

VALIDATION

Internal correlations are shown in Table below.

Table. Within Sample Correlations in the Technophobia and Technophilia Test (N = 625)

| Factors | 1 | 2 | 3 | 4 |
|--------------------------------------|------|-------|------|---|
| 1. The use of new technology at work | 1 | | | |
| 2. Technology at workplace | 0.57 | 1 | | |
| 3. Technophilia | 0.34 | 0.34 | 1 | |
| 4. Technophobia | - | -0.20 | 0.13 | 1 |

All presented correlations are statistically significant ($p < 0.05$)

RELIABILITY

Internal consistency reliability (Cronbach α or coefficient alpha) was 0.90; Generally ranges from 0.81 to 0.95 (see Table below).

Table. Reliability Statistics for Technophobia and Technophilia Test (N = 625)

| Technophobia and Technophilia Factors | Number of items | Reliability Statistics* Cronbach α |
|---------------------------------------|-----------------|--|
| 1. The use of new technology at work | 6 | 0.81 |
| 2. Technology at workplace | 5 | 0.87 |
| 3. Technophilia | 20 | 0.90 |
| 4. Technophobia | 13 | 0.95 |

* Widely is accepted .70 coefficient alpha as a standard (Nunnally, 1978)

ESTONIAN NORMS

Estonian Norms for Technophobia and Technophilia Test (see Table). Estonian norms are based on 404 people from 2 samples i.e. one general sample and one occupational sample.

Table. Descriptive statistics of Technophobia and Technophilia Test results in Estonia. Scales are from 1-point “Never, very infrequently” to 6-points “Very frequently, always” or from 1-point “Very strongly disagree” to 6-points “Very strongly agree”.

| Technophobia and Technophilia Factors | NURSES (N=87) | | EST (N=317) | |
|---------------------------------------|---------------|------|-------------|------|
| | M | SD | M | SD |
| 1. The use of new technology at work | 3.98 | 1.03 | 3.87 | 1.21 |
| 2. Technology at workplace | 4.84 | 0.88 | 4.73 | 0.97 |
| 3. Technophilia | 3.08*** | 0.69 | 3.37 | 0.69 |
| 4. Technophobia | 2.26 | 0.93 | 2.30 | 0.97 |

Occupational sample is significantly different from the EST sample: * $p < 0.05$;

** $p < 0.01$; *** $p < 0.001$

POLISH NORMS

Polish Norms for Technophobia and Technophilia Test (see Table). Polish norms are based on 218 people from one general sample.

Table. Descriptive statistics of Technophobia and Technophilia Test results in Poland. Scales are from 1-point “Never, very infrequently” to 6-points “Very frequently, always” or from 1-point “Very strongly disagree” to 6-points “Very strongly agree”.

| Technophobia and Technophilia Factors | M | SD |
|---------------------------------------|------|------|
| 1. The use of new technology at work | 3.70 | 1.27 |
| 2. Technology at workplace | 4.50 | 0.99 |
| 3. Technophilia | 3.86 | 0.79 |
| 4. Technophobia | 2.56 | 1.16 |

CORRELATION BETWEEN TECHNOPHOBIA and TECHNOPHILIA AND PERCEIVED PERFORMANCE

Reliability between Technophobia and Technophilia Test and Perceived Performance Scale (PPS) was 0.93.

Table. Correlations between Technophobia and Technophilia Test and perceived performance (measured by Perceived Performance Scale) (N =625)

| Technophobia and Technophilia | Perceived performance |
|--------------------------------------|-----------------------|
| 1. The use of new technology at work | 0.16 |
| 2. Technology at workplace | 0.19 |
| 3. Technophilia | 0.04 |
| 4. Technophobia | 0.09 |

No statistically significant correlations

PUBLICATIONS and/or CONFERENCES

(Bibliography of Studies Using the Technophobia and Technophilia Test)

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