

Developing media literacy with technical university students

Libuše Páleníčková¹

Abstract

The paper deals with topics to help students of technical universities find their bearings in the world overwhelmed by information. It deals with the questions how and where to look for the truth and whether it is possible at all. Most adolescents enter adulthood with the belief that they want to “live in the truth”, not in the world of lies. But how can this belief be put into practice in everyday life? The article leaves aside the philosophical debate on the meaning of the term “truth”, and focuses on the practical side of the matter. It proposes to include in the teaching of social sciences the following topics: Why cannot one objectively evaluate information? Can independent media be distinguished? How do propaganda and misinformation campaigns work? What are conspiracy theories? How do you distinguish a factual information from an opinion? This concept of instruction can help teach technical university students not to fall prey to disinformation and to find their bearings in the confusing world full of information.

Entwicklung der Medienkompetenz bei Studenten der technischen Universitäten

Zusammenfassung

Der Beitrag befasst sich mit den Vorschlägen, wie man den Studenten der technischen Universitäten helfen kann, sich in der von Informationen überfüllten Welt zu orientieren. Es wird darüber nachgedacht, wie und wo nach der Wahrheit zu suchen ist und ob es überhaupt möglich ist. Die meisten Adoleszenten treten ins Erwachsenenalter mit der Überzeugung ein, dass sie in der „Wahrheit leben“ wollen, nicht in der Welt der Lügen. Aber wie kann man diese Überzeugung im Alltag verwirklichen? Der Artikel lässt beiseite die philosophischen Debatten zum Thema Bedeutung des Begriffs „die Wahrheit“ und konzentriert sich auf die praktische Seite der Sache. Es wird vorgeschlagen, in die Lehre der Sozialwissenschaften folgende Themen einzugliedern: Warum kann der Mensch die Informationen nicht objektiv auswerten? Ist es möglich die unabhängigen Medien zu erkennen? Wie funktionieren Propaganda und Desinformationskampagnen? Was sind Verschwörungstheorien? Wie man eine sachliche Information von der Meinung unterscheidet? Ein so konzipierter Unterricht kann dazu helfen, dass die Studenten der technischen Fakultäten lernen, den Desinformationen nicht zu unterliegen und sich in einer unübersichtlichen von Informationen gefüllten Welt zu orientieren.

Keywords:

Media literacy
Students of technical universities
Information and misinformation

Schlüsselwörter:

Medienkompetenz
Studenten der technischen Universitäten
Informationen und Desinformationen

¹ VŠB – Technical University of Ostrava, 17. listopadu 15/2172, Ostrava – Poruba, 708 33
E-mail: libuse.palenickova@vsb.cz

1 Introduction

“The difference between dictatorship and liberal democracy consists in the social agreement that, despite the freedom of lying, its universal cement is the respect for the truth.” (Šimečka, 2017, p. 8) In established democracies, it was always true that the politics convicted of lies were forced to resign. Today, these individuals attack the media, blame them for a lie and very often, despite proven apparent lying, they manage to maintain their posts. Freedom of speech allows politicians to take power by means of lies, and then to abolish freedom and establish censorship. The Czech Republic and other Central and Eastern European countries have a first-hand experience with this approach. The victory of the Communists in the 1946 election in the former democratic Czechoslovakia was made possible by a series of false promises, for example, that no smaller enterprises would be nationalized, that there would be no collectivization of agriculture, and that freedom of expression would be preserved. Already in 1948, after the Communists took power, all the promises were denied. Politicians’ election teams today, using advanced technical means, can map out the emotional reactions of listeners and present only the information that is perceived positively and that people want to hear. The word “alternative truth” appears in journalists’ vocabulary. Facebook and Google are attempting to deploy disinformation detection tools, and some European governments are making similar efforts. However, it may happen that most people will no longer want to hear the truth, they will not want to believe it. Searching for the truth is not modern in postmodern times. Why bother when the life of even the most shocking news is only lasts for hours, or for days, at maximum.

It is hard to imagine that this development could be stopped. The task of teachers educating the future middle class, which has always been seen as a guarantee of liberal democracy, is to draw the students’ attention to these trends and, if possible, at least prepare and orient them a little. Students will decide who they will vote for in the elections, and to make such a decision, they also need sufficient information besides critical thinking. In the context of humanities taught at technical universities, it is appropriate to teach students to work not only with the technical information needed to successfully complete the studies, but also with the information they receive on a daily basis through the media and social networks.

The teaching of media literacy is poorly developed at secondary schools in the Czech Republic. Most schools mention it only in civic education classes. Only at 14% of grammar schools and 5% of vocational training schools and trade schools it is taught as a compulsory subject. Yet, 35% of the head-masters and teachers of the schools surveyed described media education as very important and 41% as important. The most important goal of media education is, according to respondents, the development of critical thinking. It was reported by 47% of the grammar school and 31% of the secondary school representatives.¹

2 Topics for teaching

Teaching assumes that students prepare for the classes. This will certainly not be a problem, because the media information can hardly be avoided. The most appropriate method of media education is to put questions that strengthen analytical thinking and creative processes of construction and reproduction. The aim of the lesson is to strengthen the ability to observe and interpret, to reveal biased and stereotypical attitudes, to discover the motivation of the message, to reveal the hidden meanings, etc. This article presents some topics that can be used to give students an idea of the impact that media make.

2.1 Why we do not actively look for the truth and why we believe false messages

During evolution, humans did not develop the ability to objectively evaluate data. For survival, it was important to believe emotionally strong, terrifying news, even though they turned out to be untrue. One of the theories that try to explain why people succumb to false information is the “confirmation bias” theory, which is generally accepted. It is based on the assumption that people evaluate information based on so-called confirmation distortions. In evaluating information, the individual favours those facts that support his or her views and weakens or ignores those that are inconsistent with his beliefs. This is a kind of cognitive distortion, which often causes erroneous evaluation of information. Distortion grows if the information has an emotional charge or if it is the case of a strongly rooted attitude. The tendency to distort is not related to either intelligence, expertise or breadth of knowledge, but rather to the perception of one’s own identity and

personality motivational structure. The practical impact of such behaviour looks like this: “I read only the pages that support my opinions and I believe everything I read.” People who are threatened by distortions most are those who are vulnerable in some way. The propensity to believe false messages and to be subject to conspiracy theories grows with the degree of social exclusion of an individual. It is hard to persuade a person to change their opinions and attitudes, because people perceive their own opinion as their property and they do not like to get rid of it. The path to objective perception of information first leads through awareness of our own opinions and attitudes. Only consistent self-knowledge will bring a degree of objectivity into the perception of an individual.

The reluctance to accept other views is also explained by the psychological theory of cognitive dissonance by L. Festinger (1957). According to this theory, people are motivated to perceive those parts of reality that suit them and to ignore what is unpleasant to them. Thus, they avoid incongruity between expectation and objective reality.² It is a case of the effort of the brain to maintain the stability of the psychic environment by denying or changing information that is not in line with its image of the world.

Topics for teaching:

What positive information do the media bring?

What media do you follow?

Compare your interpretation of the media message with your colleagues' interpretation.

Describe your own views and attitudes concerning a particular current political situation.

What do you think would make you change attitudes and opinions?

2.2 Propaganda and disinformation campaigns

The intention of propaganda in general is to persuade the addressees to accept the ideas, attitudes and patterns of behaviour presented by the propagandist. Propaganda and disinformation campaigns are not a new element in human history. Falsification of reality was already taking place in antiquity. In the Egyptian Abu Simbel, Pharaoh Rameses II is pictured on the walls of the temple as the victor of the battle against Hittites, despite the fact that the Hittites were not defeated and the Egyptians suffered great losses.

Today, new misinformation trends are spreading. The news makes the impression that it has been released by renowned media, such as fake videos with the BBC logo. A significant politician or author is often referred to as the source, although they have no idea about it. The media that erase the difference between facts and fiction are most dangerous. They include sensational events and misinformation among standard news articles, thus manipulating readers. They use a politically incorrect language, which is appreciated by many readers considering today's hypercorrection of the official media. An example of such a news server in the Czech Republic is *Parlamentní listy* (Parliamentary Newspaper) owned by the Senator Valenta.

The trend is also fake news. Invented news is most widely spread in the United States, where their authors make huge advertising revenue. Because they are in the English language, they can have a worldwide reach, which increases the income of their authors even more. An example from France shows how fake news is trying to influence politics. In February, a French version of the Russian Sputnik News server released an article stating that Emmanuel Macron was gay. It was the most shared fictional fact during the election of the French president. Within a few days, the information appeared in more than seventeen thousand texts. It was released by eleven states in nine languages. It is well known that the Russian side intervened with fictitious information in the US and French elections.

One example of the most famous Czech fake news uses aversion of Czech citizens towards the Gypsies. It states that the treasurer of the Gypsy party has fled with the money. The report published in 2012 returns cyclically. Originally, it was spread by the *Parlamentní listy* server, which subsequently apologized. It was taken over by several national diaries. It turned out that the Gypsy party assembly was not held at the place, nobody knew the people named and the police did not investigate any notice.

Lying is so common because it also pays off financially. For example, Paul Horner earns about \$ 10,000 a month on inventing fake news on Facebook. He influenced the election of US President Donald Trump, among other things, by the hoax, in which he claimed that members of the popular sect of the Amish vote for Trump. It does not always have to influence politics, sometimes the authors only entertain and then make money, but they affect millions of people and initially innocent entertainment can have unimaginable consequences.

It is known that false information has always spread on social networks, but today it is organized, on demand and on a huge scale. The problem is that companies like Google and Facebook are commercial companies that

have to create the environment to which users will return. Facebook uses an algorithm to filter the content of the sites according to what users like, what information they are looking for and who they write to more often. Thus, they are inconspicuously manipulated, they get only certain types of information, and they find themselves in a filtered “bubble” of opinions and information that they are close to. On the other hand, positive is the fact that Google is already trying to make sure that releasing fake news does not generate advertising revenue.

Topics for teaching:

How to disclose fake news?

What creative techniques are used to attract attention?

Estimate disinformation campaign themes.

Describe the differences between misinformation and inaccurate information.

Give specific examples of disinformation and inaccurate information.

Find out who created and broadcast the message?

2.3 Conspiracy theories

Ever declining confidence in official authority leads to the dissemination of various conspiracy theories. The Internet allows for their rapid spread as well as the interconnection of conspiracy theorists from around the world. For example, the popular theory claiming that the events of September 11 were pooled by Americans was probably a response to a very badly perceived Bush administration. If Iraq had been attacked on the pretext of non-existing contacts between Saddam Hussein and al-Qaeda in Iraq, can such a government be trusted? Another “paradise” of conspiracy theories is the interpretation of the murder of John F. Kennedy. About twenty thousand publications have been published on this topic. The official version of his death is believed by less than a third of Americans.

Disinformation creates a feeling that nothing is true, everything is possible, and it is necessary to look for conspiracy behind every logical explanation. The reason may be that the truth is sometimes boring. People expect important events to have important causes. Cyberspace perfectly suits the purpose of dogged paranoids, but also of the various jokers who conceive and spread conspiracy theories.

Topics for teaching:

Search for conspiracy theories and compare them to the official version.

What political or economic messages are concealed in the particular conspiracy theory?

Try to find the reasons for the formation of the theory, the possible motives of the authors.

Do you know any websites that deal with revealing suspicious sites with disinformation?

2.4 Independent Media

Does the decline of traditional printed newspaper threaten the independence of the media? Objective media are essential for the functioning of democracy. Many authors ponder on whether the traditional verified media will survive in today’s “post-truth” society. Revenues from printed advertising are declining, but unfortunately, it is also of digital advertising, which was expected to subsidize declining revenues from subscribers and readers of printed versions. Digital advertising moves primarily to Facebook and Google. But the example of Britain’s *Guardian* shows that readers are aware of the importance of independent media. This newspaper can be bought or read for free online. Readers of the digital version can support the newspaper with monthly contributions amounting to five to sixty pounds. The number of subscribers grew from 20 to 20,000 in 2016. It turns out that readers can appreciate high-quality news coverage of trusted media. Nevertheless, the newspaper is still at a loss.³

The booming of mobile technologies raised fears that classical journalism would come to an end. But the difference between an experienced journalist and a civilian reporter who records the event that s/he is witnessing using a mobile is crucial. The journalist analyses information, puts it into context, verifies, and ensures it makes sense. Significant newspapers have established the position of a fact-checker. Special staff daily check names, numbers, dates, statistics, verify sources of reporters. More and more readers are aware that the fastest reporting may not be most reliable. In the future, modern technology will also be involved in verifying news. IBM is developing an application that will enable to compare the information contained in a

certain text with what has been published in fifty-five million archive articles. It seems that high-quality and serious journalism also has a future in the era of digitization.

Topics for teaching:

Which media do you consider to be serious and why?

What is the difference between public and commercial media?

What is different about their news?

Do you know who owns or publishes your favourite media?

Compare the way of informing about a certain event in a serious and unreliable medium.

Discuss the Code of Ethics for journalists.

2.5 How to distinguish factual information from disinformation

The basic recommendation is to read proven and verified servers, identify the ownership structure of the media, and verify information. Find out where the information comes from and who benefits from their publication. In the past, most information was gained from the printed text; today we are following the transition from text to image perception. This is accompanied by intense sounds. The news must reach the recipient quickly, you cannot waste time. The listener or reader is not patient. Reading on more than just a headline is annoying to many. Read the whole article is advice that seems to be nonsensical, but most students in the classroom admit that they only read the titles, or they just “scan” the article with the eyes. Searching for the author of the text is also a way to avoid disinformation. The text should be signed, information about the author should be traceable. Anonymous articles or those signed only by an abbreviation are suspicious. Beware of the satire. It is supposed to be fun and it is best if it balances on the brink of credibility.

The ubiquitous cameras and sensors will “make the world more transparent”. It will be possible to verify a lot of information. Verification of messages in the Czech Republic is dealt with by Demagog.cz or Český rozhlas (Czech Radio), in English Fact-Check.org or PolitiFact.com.

Topics for teaching:

Is it a motive of a particular media message to inform, convince or entertain?

Search for satirical websites or articles and compare disinformation.

Try to understand and describe the difference between information and opinion.

Give your opinion and support it with an argument.

Discuss the opposite view.

3 Conclusion

Knowing the truth in the flood of information is getting harder. There will always be a part of citizens who will not be interested in truthful facts; they will only take interest in information that supports their attitudes and opinions. They will believe everything that is consistent with their conviction. The seminar wants to offer a way for students who ponder on whether someone is manipulating with us and who want to search for resources and the motives of information providers. The need for such instruction is substantiated by the facts. According to the Median agency survey, Czech secondary school students have average media education for a maximum of 10 hours throughout their schooling. The aim of the article is to inspire humanities teachers at technical universities to include media education chapters in the teaching of social science subjects.

References

- Hartl, P., Hartlová H. (2004). *Psychologický slovník*. Portál, Praha.
- Klayman, J. (1995) „Varieties of confirmation bias,” in *Decision Making from Cognitive Perspective*, J. Busemeyer, R. Hastie, and D. L. Medin (1995) *Psychology of Learning and Motivation*, Academic Press, New York.
- Lauder, S. (2017) *Do boje proti lžím*, s. 22 - 25, *RESPEKT SPECIÁL*, ročník III, č. 1/2017, *Economia*, a. s., Praha.

Pomerantsev, P. (2014) Nothing Is True and Everything Is Possible: The Surreal Heart of the New Russia, PublicAffairs.

Strachota, K., Valůch, J. (2008) Být v obraze. Praha.

Šimečka, M. (2017) Nepřátelé pravdy, s. 6 – 9, RESPEKT SPECIÁL, ročník III, č. 1/2017, Economia, a. s., Praha.

Agentura MEDIAN. (2017) Výuka mediální výchovy na středních školách. 02. 09. 2017.

https://www.jsns.cz/nove/pdf/6517001_medialni_vychova_zprava_final.pdf

Notes:

¹ Agentura MEDIAN (2017). *Výuka mediální výchovy na středních školách*.

² Hartl, P., Hartlová H. (2004). *Psychologický slovník*, Praha.

³ Lauder, S. (2017.) *Do boje proti lžím*, s. 22 - 25, RESPEKT SPECIÁL, Praha.