

SAMOUSLUŽIVANJE, KAO NOVI KONCEPT DOBIJANJA USLUGA U JAVNOJ UPRAVI

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SAŽETAK

U ovom radu se bavimo samousluživanjem koje bi javna uprava mogla da obezbijedi svim korisnicima određenih usluga. Ovdje predlažemo primjenu elektronskog i mobilnog samousluživanja u javnoj upravi, te korištenje nekih novih koncepata koji mogu biti podrška takvoj usluzi. Navešćemo i čega bi se i korisnik usluge i javna uprava trebali pridržavati u implementaciji samousluživanja uz korištenje računara i mobilnih uređaja. Takođe ćemo navesti i ključne elemente koje je neophodno uzeti u obzir prilikom omogućavanja korisnicima samousluživanje, te šta je sve korisniku neophodno za efikasno samousluživanje, dolaženje do usluge elektronskim ili mobilnim putem (e-m-Usluga). U radu ćemo dati i dio rezultata iz istraživanja o korištenju novih tehnologija u javnoj upravi koje je provedeno u periodu od 1. 10. 2022. godine do 31. 12. 2022. godine.

Ključne riječi: korisnik usluga, javna uprava, samousluživanje, neophodne tehnologije.

SELF-SERVICE, AS A NEW CONCEPT OF OBTAINING SERVICES IN PUBLIC ADMINISTRATION

ABSTRACT

In this paper, we are dealing with self-services that public administration could provide to all users of certain services. Here, we propose the application of electronic and mobile self-service in public administration, and the use of some new concepts that can support such service. We will also state what both the service user and the public administration should adhere to in the implementation of self-service with the use of computers and mobile devices. We will also list the key elements that must be taken into account when enabling users to self-service, and what the user needs for efficient self-service, accessing the service electronically or mobile (e-m-Service). In the paper, we will also present part of the results from the research on the use of new technologies in public administration, which was conducted in the period from October 1, 2022, to December 31, 2022.

Keywords: service user, public administration, self-services, necessary technologies

1 UVOD

Digitalizacija javne uprave može pomoći u povećanju njene efikasnosti, a nove tehnologije postaju ne samo alat za implementaciju modernije javne uprave, već u značajnoj mjeri određuju smjer promjena. Možemo pretpostaviti da će visok stepen digitalizacije javne uprave obezbjediti viši nivo kvaliteta njenih usluga, povećanje efikasnosti njenog rada, a u konačnici i samousluživanje korisnicima svojih usluga.

Sadašnje uslužno okruženje karakteristično je po brzim i radikalnim promjenama, a daje naglasak na isporuke jeftinije, efikasnije i korisniku prilagođene usluga. Neophodne promjene u uslužnom okruženju traže nove modele usluživanja u odnosu na dosadašnju praksu. Postoji potreba za korištenjem takvih tehnologija koje omogućuju sveobuhvatno, brzo i efikasno usluživanje ili samousluživanje na osnovu svih dostupnih podataka, informacija i znanja, unutar i izvan javne uprave. Sada korisnik usluga koji dobija usluge od uprava, upravnih organizacija i jedinica lokalne samouprave (opština i gradova), uglavnom traži određene: Uvjerenja, Potvrde, Odluke, Rješenja, Izvode i slično. Uprave, upravne organizacije, te jedinice lokalne samouprave daju oko 170 različitih usluga svojim korisnicima. Da bi usluga bila jeftinija i efikasnija i da bi se mogla ponuditi korisnicima u vidu samousluživanja moraju se davaoci usluga puno više povezati nego što je to sada slučaj.

Veliki broj naučnika, a i onih koji se detaljnije bave javnom upravom, tvrde da javna uprava nema opšteprihvaćenu definiciju. Da bi u ovom radu mogli pratiti na koji način javna uprava daje usluge, navešćemo jednu njenu definiciju koja po

nama najbolje oslikava njen rad i ulogu: „Javna uprava je sistem organa, organizacija i tijela i međuzavisan skup nadležnosti, poslova i zadataka, specifično povezan i vođen sa ciljem primjene pravnih normi, organizacionih instrumenata, metoda upravljanja, procesa i procedura radi zadovoljenja uslužnih potreba svojih korisnika. Njene osnovne funkcije su: uslužna, regulativna, organizaciona i izvršna“.²⁵

Ovdje ćemo se baviti samo jednom njenom funkcijom - uslužnom, a to je davanje usluga svojim korisnicima. Javna uprava daje usluge, a obuhvata usluge isporučene od strane javne uprave (ili javnog sektora) građanima, privredi (biznisu), te svim organizacijama i institucijama. Usluge javna uprava može obaviti direktno, da korisnik dođe na određeno mjesto u određeno vrijeme po nju ili korištenjem novih tehnologije. Uz isporuku javnih usluga vezan je društveni konsenzus da određene usluge moraju biti dostupne svima, nezavisno o nacionalnosti, rasi, polu, ličnim primanjima, vjeroispovjesti i sl. Prema Ugovoru o osnivanju Evropske zajednice iz Amsterdama 1999. godine, javne usluge (ovdje se nazivaju i «uslugama od javnog interesa») označene su kao upravne djelatnosti opšteg interesa, uspostavljene od strane javne uprave, za koje je ona odgovorna.

Sada javna uprava svojim korisnicima može da da uslugu tako da oni dođu na određeno mjesto u određeno vrijeme i dobiju ili ne dobiju uslugu. Koliko su korisnici usluga zadovoljni takvom uslugom bavimo se u jednom dijelu ovog rada, a da li žele drugačiji način usluživanja i kako do nje doći bavimo se detaljnije u drugom dijelu ovog rada. Uz upotrebu novih tehnoloških rješenja i odgovarajućih web aplikacija ona može korisnicima da obezbijedi, da oni sami uz upotrebu novih tehnologija sebe

²⁵Prof. dr Dragoljub Kavran: Javna uprava, Beograd, 2003.

usluže po konceptu samousluživanja O klasičnom načinu usluživanja u ovom radu nećemo raspravljati, a proces samousluživanja ćemo detaljnije posmatrati.

1.1 Ključni elementi koje je neophodno uzeti u obzir prilikom projektovanja samousluživanja

- Svrha usluge – treba jasno da definiše šta se sa njom želi postići. Treba imati u vidu da različiti učesnici mogu imati i različite poglede na elektronsku i mobilnu uslugu (e-m-Uslugu).²⁶
- Obuhvat usluge – opisuje sve funkcionalnosti koje e-m-Usluga pruža korisniku. Treba imati u vidu da svi korisnici nemaju istu korist od usluge i samousluživanja, pa je neophodno imati u vidu koje dodatne vrijednosti donosi fizičkim, a koje pravnim licima. Treba razmišljati o tome koje dijelove smousluživanja (e-m-Usluge) možemo implementirati u što kraćem roku.²⁷
- Doseg usluge – Kada se radi na implementaciji samousluživanja potrebno je znati ko će biti njeni korisnici kako bi se mogla prilagoditi korisničkim potrebama, uslovima i situacijama. Ono se određuje prema tehnološkim rješenjima – koje uređaje će budući korisnici koristiti za pristup i ostvarivanje usluge (računar, telefon ili tablet).
- Situacija u kojoj se usluga koristi – traži od dizajnera samousluživanja da vode brigu o trenutnoj životnoj situaciji korisnika (putovanje, mjesto stanovanja, životna dob korisnika, ...)
- Korištenje usluge – isporuka elektronske i mobilne usluge po

konceptu samousluživanja podrazumijeva korištenje pravila koja osiguravaju jednostavno korištenje. Da bi korištenje samousluživanja bilo uspješno, korisnik mora slijediti i provesti sve potrebne korake od početka do kraja. Korisnik se mora pridržavati svih preporuka u vidu neophodne opreme i potrebnih uslužnih procedura. Koncept samousluživanja (e-m-Usluga²⁸) mora biti dostupan svim korisnicima kojim javna uprava daje uslugu.

- Odnos sa korisnikom kroz vrijeme – podrzumijeva način na koji javna uprava identifikuje korisnika samousluživanja i postupa prema njemu. Da bi obezbjedila elektronske i mobilne usluge konceptom samousluživanja, javna uprava treba izgraditi povjerenje sa pravnim i fizičkim licima. To će biti ostvareno ako uslužni digitalni sistem javne uprave bude prepoznao potrebe korisnika i jasno ih navodio na neophodne korake koje je potrebno provesti da bi se riješila uslužna/poslovna situacija. Stalnim korištenje novog uslužnog koncepta i pravna i fizička lica stvaraju pozitivno mišljenje o davaocu usluga – javnoj upravi.

Neophodno je definisati standarde razvoja samousluživanja koristeći koncept e-m-Usluge od dizajna, preko razvoja IT sistema koji to podržava, do implementacije, a pri tome je neophodno definisati sve karakteristike samousluživanja. Kod kreiranja takve usluge to treba raditi sagledavajući potrebe korisnika. Da bi to ostvarili treba obezbjediti odgovarajuće korisničko iskustvo za sve one koji budu

²⁶Suray I. et al. (2019), Public Administration and Innovation Policy in a Networked Society, International Journal of Recent Technology and Engineering, Volume-8 Issue-4, November, pp. 3604-3609

²⁷Dixon, Brian E. "Towards e-government 2.0: An assessment of where e-government 2.0 is and where

it is headed." Public Administration and Management 15, no. 2 (2010): 418.

²⁸ SALISU, KAKA. "E-Government Adoption And Framework For Big Data Analytics In." (2015): 1-28. 35 Power, D. J. (2014). Using 'Big Data' for analytics and decision support. Journal of Decision Systems, 23(2), 222-228.

koristili samousluživanja te obezbjediti da je e-m-Usluga efikasna i iz perspektive javne uprave koja ju obezbjeđuje i pruža.

Šta je javna e-m-Usluga? To je usluga koju pruža – daje javna uprava svojim korisnicima uz upotrebu informaciono komunikacione tehnologije odnosno digitalnih kanala.²⁹ Elektronske i mobilne usluge (e-m-Usluga) po konceptu samousluživanja povećavaju efikasnost rada javne uprave, automatiziraju administrativne poslovne procese, a time poboljšavaju kvalitet rada javne uprave. Za korisnike samousluživanja e-m-Usluga to obezbjeđuje brži i efikasniji način dobijanja usluga iz kuće ili kancelarije bez odlaska na šalter državnih institucija.

1.2 Samousluživanje, kao novi koncept uslužnog procesa u javnoj upravi

Koncept samousluživanja podrazumijeva da korisnik usluge sam sebe usluži. Na primjer: da svoj „Izvod iz knjige rođenih“ (Rodni list) sam proslijedi na Univerzitet ili kompaniju koja to od njega traži ili da „Uvjerenje o nekažnjavanju“ proslijedi u kompaniju koja to od njega traži, da vlasnik katastarske čestice sam preuzme i proslijedi na neophodno mjesto „Posjedovni list“ u digitalnom obliku, i slično. Treba vidjeti šta je to što je neophodno javnoj upravi da korisnicima obezbjedi samousluživanje, a šta je neophodno korisnicima usluge da sami sebe usluže.

Korisnik do usluge u digitalnom obliku može doći pomoću svog računara, tableta ili mobilnog telefona. Da bi javna uprava mogla omogućiti samousluživanje korisniku, mora ga moći pozitivno identifikovati u procesu autentifikacije. Proces autentifikacije se može provesti: prepoznavanjem pomoću određenih

identifikacijskih dokumenata (e-Potpis), identifikacije prema njihovom obliku lica, identifikacija prema otisku prsta, identifikacija prema geometriji dlana, identifikacija prema zjenici oka, obliku uha, rukopisa, glasa i slično.

Identifikacija korisnika u procesu samousluživanja preko otiska prsta bi bila najjeftinije rješenje jer u dosta zemalja u svijetu otisak prsta već postoji u digitalnom obliku.

1.3 Karakteristike e-m-Usluge

Javna uprava nudi koncept elektronske i mobilne usluge (e-m-Usluge), a korisnici koriste koncept samousluživanja da bi sebi obezbjedili neophodnu uslugu uz korištenje računara ili mobilnih uređaja.³⁰ Karakteristike elektronske i mobilne usluge:

- Obezbjeđuje se putem Interneta ili mobilne mreže;
- Ostvaruje se automatski;
- Ne zavisi od uređajima pomoću kojih se isporučuje, a to mogu biti računari, mobilni telefoni, tableti itd.;
- Obezbjeđuje se na daljinu i ne zahtjeva prisustvo obe strane u isto vrijeme i na istom mjestu kao kod klasične usluge;
- Obezbjeđuje personalizaciju i prilagođava se korisnicim usluga i njihovim sklonostima.

Kako bi se gore navedeni načini zabave u igri primjenjivali na korisnika potrebno je svakoj vrsti korisnika pristupiti na drugačiji način putem odgovarajućih mehanizama.

1.3.1 Standardi za razvoj e-m-Usluge

Standardi koji se koriste za razvoja e-m-Usluge treba da osiguraju da se tokom

²⁹ Chen, Yu-Che, and Tsui-Chuan Hsieh. "Big data for digital government: opportunities, challenges, and strategies." In *Politics and Social Activism: Concepts, Methodologies, Tools, and Applications*, pp. 1394-1407. IGI Global, 2016

³⁰ Basu, Subhajit. "E-government and developing countries: an overview." *International Review of Law, Computers & Technology* 18, no. 1 (2004): 109-132.

procesa implementacije e-m-Usluge od njenog dizajna i razvoja do korištenja, sagledavaju iz perspektive samog korisnika koji uslugu sam sebi može osigurati samousluživanjem.³¹

Pri tome se mora voditi računa o: korisničkim potrebama, dostupnosti usluga, pristupu, dizajnu, tehnologijama.

Javna uprava svojom e-m-Uslugom treba da:

- zadovolji potrebe i zahtjeve svih korisnika;
- omogući pristup svim grupama korisnika;
- prepozna korisničke potrebe za uslugom;
- obezbjedi korištenje postojeće infrastrukture;
- obezbjedi praćenje efikasnosti usluživanja i njihove troškove;
- zaštititi sve lične podatke korisnika;
- ispoštuje ogrovarajuće tehničke standarde.

Oni koji budu u javnoj upravi radili na implementaciji e-m-Usluge moraju poznavati potrebe i izazove koje korisnici usluga žele riješiti, a da bi to osigurali moraju:

- poznavati korisničke potrebe te njihove životne - poslovne situacije;
- poznavati i analizirati do sada provedena istraživanja u domeni e-m-Usluge;
- koristiti model prototipa za brzu provjeru pretpostavki gdje god je to izvodivo;
- analizirati dostupne podatke o davanju usluga na klasični način.

Treba uvijek imati u vidu da je cilj svake e-m-Usluge obezbjeđivanje rješenja za

određene potrebe korisnika, a da one nisu propisane zakonima, uredbama ili nekim pravilnicima.

Da bi se znale korisničke potrebe neophodno je provesti istraživanje koje bi obezbjedilo potpuno razumijvanje potrebe korisnika, pa tek onda se može pristupiti definisanju opsega e-m-Usluge.

Da bi se implementirala efikasna e-m-Usluga treba se poznavati potreba različitih korisnika, osoba sa invaliditetom, starijih ili mlađih, jer svi oni imaju različito predznanje i iskustvo u korištenju novih tehnoloških rješenja. Korisničko iskustvo podrazmijeva i vjerovanje, emocionalno iskustvo, psihičko i fizičko stanje i slično, a ono se stvara prije, tokom i nakon korištenja e-m-Usluge. To iskustvo je najvažniji pokretač korištenja e-m-Usluge. Zbog toga bi e-m-Usluga trebala biti jednostavna za korištenje i onim sa nižim obrazovanjem, kao i onih sa nekim invaliditetom.³²

Korisničko iskustvo i korisničko okruženje - odnosno raspored prozora na ekranu su osnova za njegovo veće korištenje.

Dobro korisničko oruženje za e-m-Usluge obezbjeđuje:

- korisnicima (i pravnim i fizičkim licima) da dođu do usluge, a da ne moraju poznavati način njenog funkcionisanja;
- da neophodne postupke korisnici provedu na veoma jednostavan način;
- da korisnici kroz mali broj koraka dođu do neophodne usluge;
- svim grupama korisnika da do usluge dođu na lak način.

³¹Radivojević, M., From electronic business to business intelligence in public administration. JU Official Gazette of the Republic of Srpska, Banja Luka, 2012. ISBN 978-99938-22-28-8, COBISS.BH-ID 2411288.

³² Peña-López, Ismael. "UN eGovernment Survey 2016. EGovernment in Support of Sustainable Development." (2016).

Dizajn korisničkog okruženja treba biti fokusiran na samog korisnika i treba da mu obezbjedi prijatno korištenje.³³

1.4 Kako do samousluživanja

Prilikom kreiranja nove uslužne strategije uspješne uprave, upravne organizacije i jedinice lokalne samouprave moraju da analiziraju i utvrde elemente koji bitno pridonose davanju i nuđenju boljih usluga, te osiguravaju kvalitetniju uslugu, obezbjeđuju zadovoljstvo korisniku. Svoj rad i usluživanje treba da zasnivaju na prednostima zajedničkog znanja i vještina svih zaposlenih u cijeloj javnoj upravi. Ovo znači da bi znanju kao danas najjačem oružju u stvaranju uslužne prednosti i nuđenju usluga trebalo dati puno veći značaj.

Prvi od problema koji se pojavljuje je u stvaranju preduslova i potrebne infrastrukture za samousluživanje je nedovoljna saradnja između učesnika u uslužnom lancu. Razvoj informaciono-komunikacionih tehnologija omogućava uspješno rješavanje navedenog problema, jer obezbjeđuje bolje i funkcionalnije povezivanja. Prvi korak prema javnoj upravi koja nudi samousluživanje je skup metoda, alata i web aplikacija koje omogućavaju funkcionisanje takvog informacionog sistema u realnom vremenu.

Samouslužni sistemi u realnom vremenu danas se smatraju posebnom disciplinom koja u sebi uključuje elemente strategije, uslužnog procesa, uslužne analize i informacionih tehnologije. Oni omogućavaju prikupljanje, analizu, distribuciju i djelovanje uslužnih informacija između uprava, upravnih organizacija i jedinica lokalne samouprave

(javne uprave), a sve u cilju boljeg poznavanja korisnika, lakšeg rješavanja samouslužnih problema.

Ako želimo da elektronsko i mobilno usluživanje javne uprave ispuni svoj cilj i svrhu postojanja, mora ispuniti sljedeće preduslove:

- osigurati pristup uslugama i informacijama svim zaposlenim i svim korisnicima usluga;
- mora sadržavati veliku količinu podataka i informacija o usluzi, davaocu i korisniku usluge;³⁴
- sve uslužne transakcije relevantne za efikasno samousluživanje moraju biti u sistemu;
- mora biti uvijek raspoloživo i oblikovano tako posluži svrsi kojoj je namjenjeno;
- mora zadovoljavati odgovarajuće mjere zaštite i tajnosti osjetljivih podataka.³⁵

U radu ćemo navesti i neka od pitanja koja mogu navesti na drugačija razmišljanja o radu i ulozi javne uprave. Može li se desiti da samousluživanje pojedine uprave i upravne organizacije jednostavno „ugasi“? Može li se dogoditi da sve poslove preuzme neka „NOVA JAVNA UPRAVA“ bazirana na novim tehnološkim rješenjima? Uprave bez zaposlenih. Mogu li nove tehnologije dovesti do jedne i jedinstvene javne uprave?

Ova i slična pitanja neka ostanu trenutno bez potrebnih odgovora, jer je to sigurno ono na čemu treba još puno raditi.

1.5 Neki od rezultata provedenog istraživanja o davaocima i korisnicima usluga

³³ Ivet Tooy, *Electronic Government: Cross-sectoral Development of Information Tehnology in Central Government*

³⁴ Soete L., Weehuizen R. *The Economics of e-Government: A bird's eye view*. University of Maastricht: MERIT, 2003.

³⁵ Srivastava, S.K., and P.K. Panigrahi. 2016. The impact of e-government and e-business on economic performance: a comparative study of developing and developed countries. *Journal of Contemporary Issues in Business and Government*, The 22 (1): 36–50.

U dijelu zemalja posebno onih nastalih poslije raspada socijalističkog sistema, prevladava mišljenje da je javna uprava prekobrojna, da nije efikasna, da ne ispunjava efikasno potrebe građana, te da nepotrebno postoje određeni uslužni nivoi. Dobar dio teoretičara smatra je loša njena efikasnost zbog preglomazne institucionalne strukture.³⁶

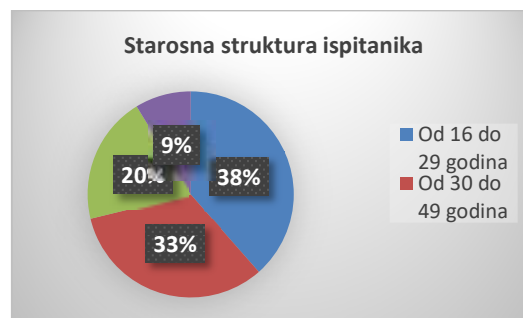
U periodu od 1. 10. 2021. godine do 31. 12. 2022. godine proveli smo istraživanje u većem broju evropskih zemalja u uslugama koje im javne uprave daju. Istraživanje je provedeno u nekim zemljama koje su članice Evropske unije i zemljama koje to nisu, preko odgovarajućeg upitnika. Najviše rezultata ankete je prikupljeno iz zemalja Balkana. Nositelj istraživanja bio je Internacionalni Univerzitet Travnik u Travniku, Bosna i Hercegovina, i sa određenim konzorcijem od više visokoškolskih ustanova i fakulteta.

U istraživanju je učestvovao veliki broj svršenih studenata koji sada rade u skoro svim zemljama Evrope, te više od 300 redovnih i vanrednih studenata koji su prikupljali podatke iz upitnika anketiranjem ili online popunjavanjem upitnika. Veoma značajni podaci prikupljeni su od 1267 anketiranih građana iz zemalja koje su članice Evropske unije, a znatno veći broj anketiranih je iz zemalja koje nisu u evropskoj uniji. Prikupljeni podaci su statistički obrađeni upotrebom dva softverska alata, Microsoft Excel i IBM SPSS. Upotrijebljeni su sljedeći statistički postupci: Deskriptivna statistika, T test, Test pouzdanosti.

Ovdje ćemo dati samo neke od prikupljenih rezultata.

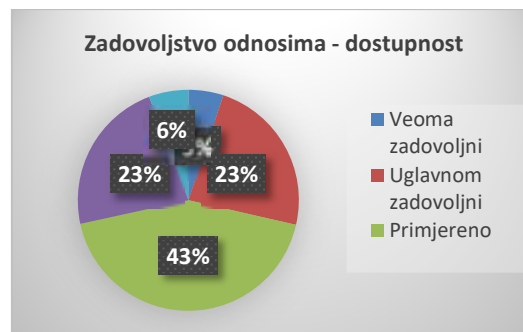
Ovdje treba imati u vidu da su anketu najviše provodili studenti i da je u

rezultatima od 1267 anketiranih njih 488 pripadalo dobi od 16 do 29 godina. Svi koji su provodili anketu imali su uputstvo da pokušaju anketirati približno jednak broj muškaraca i žena i da pokušaju anketirati sve starosne skupine. Starosnu dob anketirani su mogli da biraju između: Od 16 do 29 godina, Od 30 do 49 godina, Od 50 do 64 godine i Preko 65 godina, a rezultati su dati na Slici 1.



Slika 1. Starosna struktura anketiranih

Jedno od pitanja u anketnom upitniku odnosilo se na zadovoljstvo dostupnošću usluga koje daje javna uprava. Od 1267 anketiranih uglavnom je zadovoljno dostupnošću uslugom 297, a uglavnom je nezadovoljno dostupnošću uslugom koju daje javna uprava je 287 anketiranih. Veoma zadovoljnih dostupnošću uslugom je 65 anketiranih, a veoma nezadovoljnih dostupnošću uslugom je 73 anketirana – Slika 2.

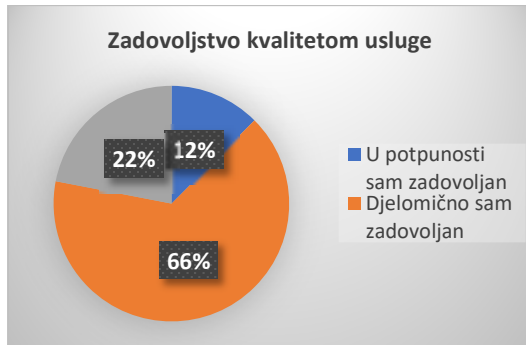


Slika 2. Zadovoljstvo dostupnošću usluga

³⁶ Wirtz, B. W., J. C. Weyerer & C. Geyer (2019) Artificial intelligence and the public sector—

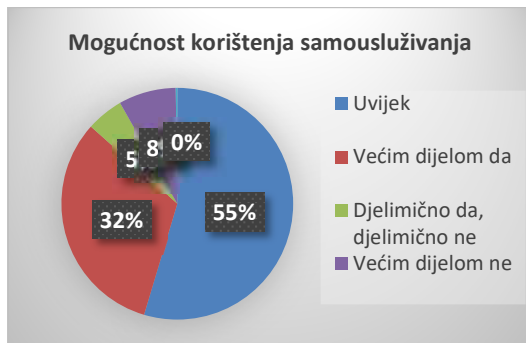
Applications and challenges, *International Journal of Public Administration*, 42 (7), 596-615.

Na pitanje o zadovoljstvu kvalitetom usluge koju daje javna uprava, anketirani su mogli da biraju između sledećih odgovora: U potpunosti sam zadovoljan, Djelomično sam zadovoljan i Nisam zadovoljan, a rezultati ankete su prikazani na Slici 3.



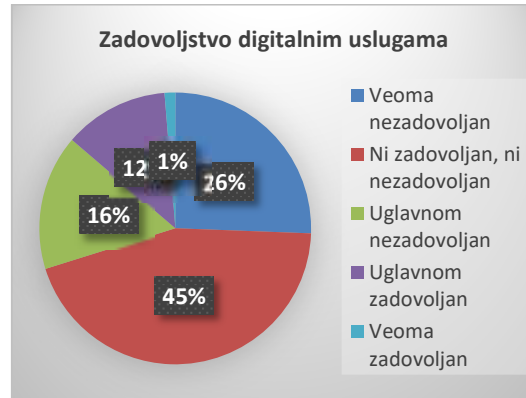
Slika 3. Zadovoljstvo kvalitetom usluge

Na pitanje: „Ako bi Vam javna uprava omogućila samousluživanje, da li bi ga koristili?“ anketirani su mogli da biraju jedan od sljedećih ponuđenih odgovora: Uvijek, Većim dijelom da, Djelimično da, djelimično ne, Većim dijelom ne, Uopšte ne. Rezultati ankete dati su na Slici 4.



Slika 4. Mogućnost korištenja samousluživanja

Na pitanje: „Koliko ste zadovoljni elektronskim i mobilnim uslugama koje sada daje javna uprava?“ anketirani su mogli da biraju jedan od ponuđenih odgovora: Veoma nezadovoljan, Ni zadovoljan, ni nezadovoljan, Uglavnom nezadovoljan, Uglavnom zadovoljan, Veoma zadovoljan, a rezultati su predstavljeni na Slici 5.



Slika 5. Zadovoljstvo digitalnom uslugom

Navešćemo još neke rezultate do kojih smo došli u provedenom istraživanju:

- Od 1267 anketiranih bilo je 111 onih koju su stariji od 65 godina od kojih je 66 % veoma zadovoljno uslugom koju daje javna uprava na klasičan način da se ode na određeno mjesto u određeno vrijeme po uslugu. Takođe stariji od 65 godina njih 86% većim dijelom ne bi koristili samousluživanje i ako bi im to omogućila javna uprava.
- Na provedenom istraživanju učestvovala su 604 osobe ženskog pola od kojih je 79% u anketi odgovorilo da bi za smousluživanju koristilo mobilni telefon.
- U istraživanju je učestvovalo 651 ispitanika sa završenim fakultetom ili visokom školom a njih 94% je navelo da uglavnom nisu zadovoljni sa elektronskim i mobilnim uslugama koje sada daje javna uprava.

Nismo mogli posmatrati i praviti poređenje sa drugim provedenim istraživanja na Balkanu, jer rezultata koji se odnose na samousluživanje u javnoj upravi jednostavno nema. Ima istraživanja koji pokazuju da je administracija prekobrojna, da se nedovoljno koriste nove tehnologije, da pravna i fička lica mobilnim uređajem mogu od javne uprave dobiti samo određene informacije i slično.

Postoje istraživanja koja su provedena u razvijenim zemljama svijeta ali njihovi

životni standardi, informatizacija u javnoj upravi su na puno višem nivou i svaka usporedba bi pokazala da smo u primjeni novih tehnoloških rješenja u velikom zaostatku. Neka od njihovih iskustava sigurno možemo i trebamo koristiti u procesu implamantacije koncepta samousluživanja i na prostoru Balkana.

ZAKLJUČAK

Istraživanje koje smo proveli pokazuju da su korisnici usluga javne uprave nezadovoljni stepenom primjene novih tehnologija i zagovaraju korištenje samousluživanja i veću primjenu novih tehnoloških rješenja. Iz istraživanja se može vidjeti da starije osobe ne žele da koriste samousluživanje, a da veći postotak žena u odnosu na mušku populaciju, žele samousluživanje putem mobilnih telefona, U radu smo predložili manji dio procedura koje je neophodno provesti i u javnoj upravi i kojih bi se trebali pridržavati i implementatori i korisnici koncepta samousluživanja. Predložili smo implementaciju odgovarajuće infrastrukture koja bi to mogla da obezbjedi. Smatramo da bi naredni period trebao biti obilježen većim povezivanjem svih uprava, upravnih organizacija i jedinica lokalne samouprave, da bi se ponuđeni koncept mogao u potpunosti implementirati.

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1 INTRODUCTION

Digitization of public administration can help increase its efficiency, and new technologies become not only a tool for implementing more modern public administration, but to a significant extent determine the direction of changes. We can assume that a high degree of digitization of public administration will ensure a higher level of quality of its services, an increase in the efficiency of its work, and ultimately self-service for the users of its services.

The current service environment is characterized by rapid and radical changes, and emphasizes the delivery of cheaper, more efficient and user-friendly services. Necessary changes in the service environment require new service models compared to current practice. There is a need to use such technologies that enable comprehensive, fast and efficient service or self-service based on all available data, information and knowledge, inside and outside the public administration. Now, the user of services who receives services from administrations, administrative organizations and local self-government units (municipalities and cities), mostly asks for certain: Certificates, Certificates, Decisions, Decisions, Extracts and the like. Administrations, administrative organizations, and local self-government units provide about 170 different services to their users. In order for the service to be cheaper and more efficient and to be able to be offered to users in the form of self-service, service providers must connect much more than is the case now.

A large number of scientists, as well as those who deal with public administration in more detail, claim that public administration does not have a generally accepted definition. In order to be able to follow in this paper how public administration provides services, we will quote one of its definitions, which in our opinion best describes its work and role:

"Public administration is a system of organs, organizations and bodies and an interdependent set of competences, tasks and tasks, specifically connected and managed with the aim of applying legal norms, organizational instruments, management methods, processes and procedures to meet the service needs of its users. Its basic functions are: service, regulatory, organizational and executive". Here we will deal with only one of its functions - service, which is providing services to its users. Public administration provides services, and includes services delivered by public administration (or the public sector) to citizens, the economy (business), and all organizations and institutions. Services can be performed by the public administration directly, for the user to come to a certain place at a certain time for it or by using new technologies. In addition to the delivery of public services, there is a social consensus that certain services must be available to everyone, regardless of nationality, race, gender, personal income, religion, etc. According to the Treaty establishing the European Community from Amsterdam in 1999, public services (also called "services of public interest") are designated as administrative activities of general interest, established by the public administration, for which it is responsible.

Now the public administration can give its users a service so that they come to a certain place at a certain time and receive or not receive the service. We deal with how satisfied service users are with such a service in one part of this paper, and whether they want a different way of serving and how to get it, we deal with it in more detail in another part of this paper. With the use of new technological solutions and appropriate web applications, it can provide users with the self-service concept of self-service with the use of new technologies. We will not discuss the classic way of service in this paper, and we

will observe the self-service process in more detail.

1.1 Key elements that must be taken into account when designing self-service

- The purpose of the service - it should clearly define what is to be achieved with it. It should be borne in mind that different participants may have different views on the electronic and mobile service (e-m-Service).
- Scope of the service - describes all the functionalities that the e-m-Service provides to the user. It should be borne in mind that not all users benefit from the service and self-service in the same way, so it is necessary to keep in mind which additional values it brings to individuals and which to legal entities. We should think about which parts of self-service (e-m-Services) we can implement in the shortest possible time.
- Reach of the service - When working on the implementation of self-service, it is necessary to know who will be its users so that it can be adapted to user needs, conditions and situations. It is determined according to technological solutions - which devices future users will use to access and use the service (computer, phone or tablet).
- The situation in which the service is used – asks the self-service designers to take care of the current life situation of the user (travel, place of residence, age of the user, ...)
- Use of the service – delivery of electronic and mobile services based on the self-service concept implies the use of rules that ensure easy use. In order to use self-service to be successful, the user must follow and carry out all the necessary steps from start to finish. The user must comply with all recommendations in the form of necessary equipment and necessary service procedures. The concept of self-

service (e-m-Service) must be available to all users through which the public administration provides the service.

- Relationship with the user over time – implies the way in which the public administration identifies the self-service user and acts towards him. In order to provide electronic and mobile services with the concept of self-service, the public administration needs to build trust with legal and natural persons. This will be achieved if the service digital system of the public administration recognizes the needs of users and clearly guides them to the necessary steps that need to be taken in order to resolve the service/business situation. Constant use of the new service concept by both legal and natural persons creates a positive opinion about the service provider - public administration.

It is necessary to define the standards of self-service development using the concept of e-m-Service from design, through the development of the IT system that supports it, to implementation, and at the same time it is necessary to define all the characteristics of self-service. When creating such a service, it should be done considering the needs of the users. In order to achieve this, it is necessary to provide an appropriate user experience for all those who will use self-service and to ensure that the e-m-Service is efficient from the perspective of the public administration that provides and provides it.

What is a public e-m-Service? It is a service provided by the public administration to its users with the use of information and communication technology, i.e. digital channels. Electronic and mobile services (e-m-Service) based on the concept of self-service increase the efficiency of public administration work, automate administrative business processes, and thereby improve the quality of public administration work. For users of self-

service e-m-Services, this provides a faster and more efficient way of obtaining services from home or office without going to the counter of state institutions.

Self-service, as a new concept of the service process in public administration

The concept of self-service implies that the user of the service serves himself. For example: to forward his "Birth Certificate" (Birth List) himself to the University or the company that requests it from him, or to forward the "Certificate of Non-criminalization" to the company that requests it, for the owner of the cadastral plot to collect and forward it himself to the necessary place "Posedovni list" in digital form, and similar. It is necessary to see what is necessary for the public administration to provide self-service to the users, and what is necessary for the users of the service to serve themselves.

The user can access the service in digital form using their computer, tablet or mobile phone. In order for the public administration to be able to provide self-service to the user, it must be able to positively identify it in the authentication process. The authentication process can be carried out: by recognition using certain identification documents (e-Signature), identification by their facial shape, identification by fingerprint, identification by palm geometry, identification by eye pupil, ear shape, handwriting, voice, and the like.

Identification of the user in the self-service process through a fingerprint would be the cheapest solution, because in many countries in the world fingerprints already exist in digital form.

1.2 Characteristics of the e-m-Service

Public administration offers the concept of electronic and mobile services (e-m-Services), and users use the concept of self-service to provide themselves with the

necessary service using computers or mobile devices. Characteristics of electronic and mobile services:

- It is provided via the Internet or mobile network;
- It is realized automatically;
- It does not depend on the devices with which it is delivered, which can be computers, mobile phones, tablets, etc.;
- It is provided remotely and does not require the presence of both parties at the same time and in the same place as with the classic service;
- Provides personalization and adapts to service users and their preferences.
- In order for the above ways of entertainment in the game to be applied to the user, it is necessary to approach each type of user in a different way through appropriate mechanisms.

1.2.1 Standards for the development of e-m-Services

The standards used for the development of the e-m-Service should ensure that during the process of implementation of the e-m-Service, from its design and development to its use, it is viewed from the perspective of the user himself, who can provide the service to himself through self-service.

In doing so, care must be taken of: user needs, availability of services, access, design, technologies.

Public administration with its e-m-Service should:

- meet the needs and requirements of all users;
- provide access to all groups of users;
- recognizes user needs for the service;
- ensure the use of the existing infrastructure;
- ensures monitoring of service efficiency and their costs;
- protect all user personal data;

- complies with the relevant technical standards.

Those who will work in the public administration on the implementation of e-m-Services must know the needs and challenges that service users want to solve, and to ensure this they must:

- know user needs and their life and business situations;
- know and analyze the research carried out so far in the domain of e-m-Services;
- use the prototype model for quick verification of assumptions wherever feasible;
- analyze the available data on the provision of services in a classic way.

It should always be kept in mind that the goal of every e-m-Service is to provide solutions for specific needs of the user, and that they are not prescribed by laws, regulations or some regulations.

In order to know the user's needs, it is necessary to conduct a research that would ensure a complete understanding of the user's needs, and only then can the scope of the e-m-Service be defined.

In order to implement an efficient e-m-Service, the needs of different users, people with disabilities, older or younger, should be known, because they all have different prior knowledge and experience in using new technological solutions. User experience also includes belief, emotional experience, mental and physical state and the like, and it is created before, during and after using the e-m-Service. That experience is the most important driver of using the e-m-Service. For this reason, the e-m-Service should be easy to use even for those with a lower education, as well as for those with some disabilities.

User experience and user environment - that is, the arrangement of windows on the screen are the basis for its greater use.

Good user tools for e-m-Services provide:

- users (both legal and natural persons) to access the service without having to know how it functions;
- that users carry out the necessary procedures in a very simple way;
- that users reach the necessary service through a small number of steps;
- for all groups of users to reach the service in an easy way.

The design of the user environment should be focused on the user himself and should provide him with pleasant use.

1.3 How to self-service

When creating a new service strategy, successful administrations, administrative organizations and local self-government units must analyze and determine the elements that significantly contribute to the provision and offering of better services, and ensure better quality service and ensure user satisfaction. They should base their work and service on the advantages of common knowledge and skills of all employees in the entire public administration. This means that knowledge, as today's strongest weapon in creating a service advantage and offering services, should be given much greater importance.

The first problem that appears in creating the prerequisites and necessary infrastructure for self-service is insufficient cooperation between participants in the service chain. The development of information and communication technologies enables the successful solution of the mentioned problem, because it provides better and more functional connections. The first step towards a public administration that offers self-service is a set of methods, tools and web applications that enable the functioning of such an information system in real time.

Real-time self-service systems are today considered a special discipline that includes elements of strategy, service process, service analysis and information technology. They enable the collection, analysis, distribution and operation of service information between administrations, administrative organizations and units of local self-government (public administration), all with the aim of better knowing users and easier solving of self-service problems.

If we want the electronic and mobile service of the public administration to fulfill its goal and purpose of existence, it must meet the following prerequisites:

- ensure access to services and information for all employees and all service users;
- must contain a large amount of data and information about the service, the provider and the user of the service;
- all service transactions relevant for efficient self-service must be in the system;
- must always be available and designed to serve the purpose for which it is intended;
- must meet the appropriate protection and confidentiality measures for sensitive data.

In the paper, we will list some of the questions that can lead to different thinking about the work and role of public administration. Can it happen that the self-service of an individual administration and administrative organization simply "turns off"? Could it happen that all jobs will be taken over by a "NEW PUBLIC ADMINISTRATION" based on new technological solutions? Management without employees. Can new technologies lead to a single and unified public administration?

Let these and similar questions remain without the necessary answers at the

moment, because this is certainly something that still needs a lot of work.

Some of the results of the conducted research on providers and users of services

In some countries, especially those created after the collapse of the socialist system, the prevailing opinion is that the public administration is too numerous, that it is not efficient, that it does not efficiently meet the needs of citizens, and that certain service levels exist unnecessarily. A large number of theoreticians consider its efficiency to be poor due to its overly cumbersome institutional structure.

In the period from October 1, 2021 to December 31, 2022, we conducted research in a large number of European countries in the services provided by public administrations. The research was conducted in some countries that are members of the European Union and in countries that are not, using a corresponding questionnaire. Most of the survey results were collected from the Balkan countries. The bearer of the research was the International University of Travnik in Travnik, Bosnia and Herzegovina, and with a certain consortium of several higher education institutions and faculties.

A large number of graduated students who now work in almost all European countries participated in the research, as well as more than 300 full-time and part-time students who collected data from the questionnaire by surveying or filling out the questionnaire online. Very significant data was collected from 1267 surveyed citizens from countries that are members of the European Union, and a significantly larger number of respondents were from countries that are not in the European Union. The collected data were statistically processed using two software tools, Microsoft Excel and IBM SPSS. The following statistical procedures were used: Descriptive statistics, T test, Reliability test.

1.4 Here we will give some of the collected results.

Here it should be borne in mind that the survey was mostly conducted by students and that in the results of the 1267 respondents, 488 of them belonged to the age group of 16 to 29 years. All those conducting the survey were instructed to try to survey an approximately equal number of men and women and to try to survey all age groups. The respondents could choose their age from: From 16 to 29 years old, From 30 to 49 years old, From 50 to 64 years old and Over 65 years old, and the results are given in Figure 1.

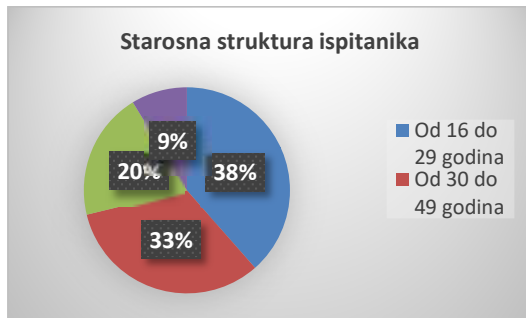


Figure 2. Satisfaction with the availability of services

One of the questions in the questionnaire was about satisfaction with the availability of services provided by the public administration. Out of 1267 respondents, 297 are mostly satisfied with the availability of the service, and 287 respondents are mostly dissatisfied with the availability of the service provided by the public administration. 65 respondents were very satisfied with the availability of the service, and 73 respondents were very dissatisfied with the availability of the service - Figure 2.

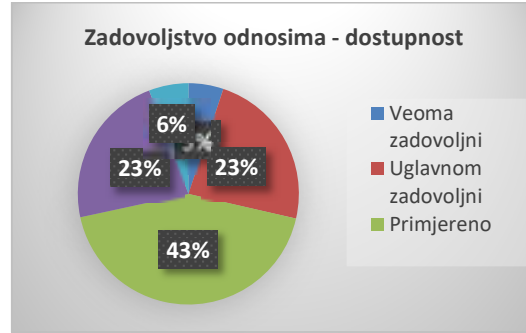


Figure 2. Satisfaction with the availability of services

When asked about satisfaction with the quality of service provided by the public administration, the respondents could choose between the following answers: I am completely satisfied, I am partially satisfied and I am not satisfied, and the results of the survey are shown in Figure 3.

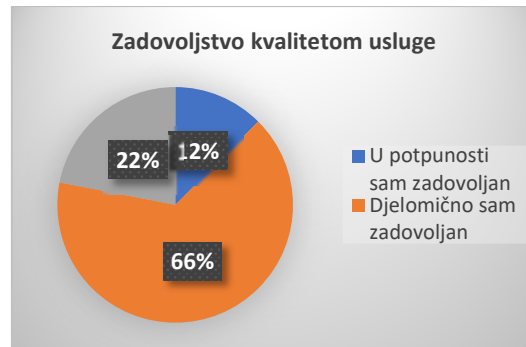


Figure 3. Satisfaction with service quality

To the question: "If the public administration provided you with self-service, would you use it?" the respondents could choose one of the following answers: Always, Mostly yes, Partially yes, partially no, Mostly no, Not at all. The results of the survey are given in Figure 4.

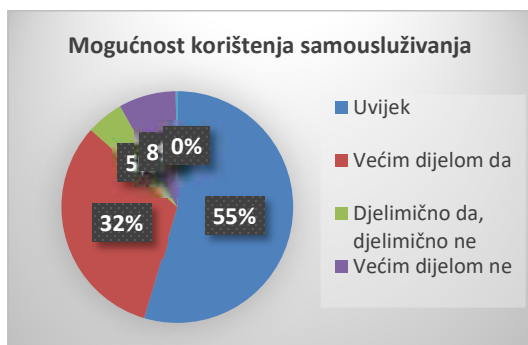


Figure 4. Possibility of using self-service

To the question: "How satisfied are you with the electronic and mobile services currently provided by the public administration?" the respondents could choose one of the following answers: Very dissatisfied, Neither satisfied, nor dissatisfied, Mostly dissatisfied, Mostly satisfied, Very satisfied, and the results are presented in Figure 5.

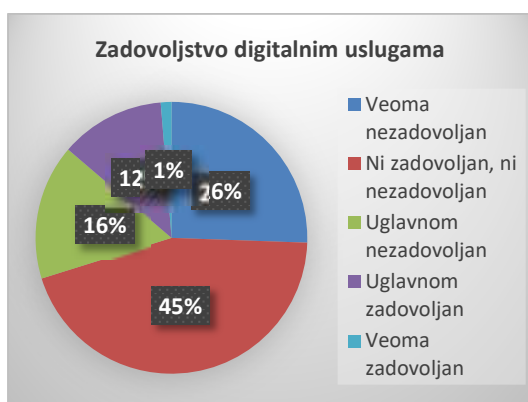


Figure 5. Satisfaction with digital service

We will list some other results that we came to in the conducted research:

- Of the 1267 respondents, there were 111 who were over 65 years old, of which 66% were very satisfied with the service provided by the public administration in the classic way of going to a certain place at a certain time for service. Also, 86% of those over the age of 65 would not use self-service even if the public administration made it possible for them.
- 604 female persons participated in the survey, 79% of whom answered in the

survey that they would use a mobile phone for self-service.

- 651 respondents with a college or university degree took part in the survey, and 94% of them stated that they are generally not satisfied with the electronic and mobile services currently provided by the public administration.

We could not observe and make a comparison with other conducted research in the Balkans, because there are simply no results related to self-service in public administration. There are studies that show that the administration is too numerous, that new technologies are not used enough, that legal entities and individuals can only get certain information from the public administration with a mobile device, and the like.

There are studies conducted in developed countries of the world, but their living standards, computerization in public administration are at a much higher level, and any comparison would show that we are lagging far behind in the application of new technological solutions. We can and should certainly use some of their experiences in the process of implementing the concept of self-service in the Balkans as well.

CONCLUSION

The research we conducted shows that users of public administration services are dissatisfied with the level of application of new technologies and advocate the use of self-service and greater application of new technological solutions. It can be seen from the research that elderly people do not want to use self-service, and that a higher percentage of women than men want self-service via mobile phones. adhere to both implementers and users of the self-service concept. We proposed the implementation of appropriate infrastructure that could ensure this. We believe that the next period should be marked by a greater connection of all administrations, administrative organizations and local self-government

units, so that the proposed concept could be fully implemented.

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