Suggested Reference


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Akademska i informaciona pismenost u srzi istrazivackog procesa: 

Akademska i informaciona pismenost u srzi istrazivackog procesa: Information Search Process, Research Skills Development Framework

Neda Zdravkovic, Learning Services Librarian
The University of Auckland, New Zealand

Libraries and Learning Services

2016
Ova prezentacija...i nije prezentacija!
https://www.youtube.com/watch?v=F_tUb-VjN3E
The University of Auckland – NO 1 in Australasia

- 8 faculties
- 40,784 students
- 30,477 Undergraduate
- 10,307 Postgraduate
- 2,400 Doctoral candidates
- International students 13%
- 4,784 Staff

- European 41%
- Asian 35%
- Maori 6%
- Pacific Island 8%
Molim vas ustanite ako...

Ste student doktorskih nauka/ radite na istrazivanju vezanim za doktorat

Radite sa studentima na fakultetu

Bavite se istrazivackim radom duze od godinu dana
Koja je uloga biblioteke na univerzitetu?

Sudenti

Istrazivacii

Strateski pristup radu – KAKO?
Enabling Student Outcomes and Success

Enabling Researcher Outcomes and Success

Delivering Service Excellence

Relevant and Fit for Purpose Resources and Infrastructure – scholarly collections, libraries and learning spaces, digital tools and infrastructure
1. Da li ‘brucosi’ / studenti prve godine fakulteta mogu/ imaju sposobnosti da rade na originalnom istrazivanju?
2. Da li studenti doktorskih nauka u Srbiji imaju neophodno razumevanje/iskustvo u istrazivackom radu?
Research Skills Development Framework

Table 1: Researcher Skill Development Framework

<table>
<thead>
<tr>
<th>Level</th>
<th>Skill Development Framework</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Adopted Research</td>
</tr>
<tr>
<td>2</td>
<td>Self-Initiated Research</td>
</tr>
<tr>
<td>3</td>
<td>Boundless Research</td>
</tr>
<tr>
<td>4</td>
<td>Constrained Research</td>
</tr>
<tr>
<td>5</td>
<td>Open Research</td>
</tr>
<tr>
<td>6</td>
<td>Engaging Research</td>
</tr>
<tr>
<td>7</td>
<td>Engaged Research</td>
</tr>
</tbody>
</table>

The framework is designed to guide researchers through various stages of skill development, from adopting new skills to engaging in impactful research. Each level builds upon the previous one, encouraging continuous learning and growth.

Note: The diagram illustrates the progression from one level to the next, with each step featuring specific skill sets and milestones to achieve.
Zasto bas RSDF i primena

1. Analiza fakultetskih programa / kurikuluma (individualni predmeti, kursevi + celokupni programi studija – razliciti pristupi)
<table>
<thead>
<tr>
<th>Semester</th>
<th>Course Year 2</th>
<th>Course Year 3</th>
<th>Learning Outcomes</th>
<th>Assessment tasks &amp; due dates</th>
<th>Gaps identified &amp; potential intervention</th>
<th>A&amp;I Integration - phase 1: Assignment-specific targeted Academic Skills Workshops - collaboration between Library Staff, ASL and SL to Integrate A&amp;I</th>
<th>Research Skills Development Framework</th>
<th>UoA Graduate Profile Attributes</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Sem 1</strong></td>
<td>FTMS 202: Hollywood and its Others</td>
<td>FTMS 307: Hollywood and its Others</td>
<td>Xuelin Zhou: Students enrolled: 09</td>
<td>Year 2: Understand the conceptual and theoretical elements of Film Studies. Be more aware of the aesthetic elements that form the film language. Be better informed about the evolution of Hollywood as industry and mass medium. Be more aware of the sociocultural influences on Hollywood. Be more capable of evaluating, applying, and presenting information.</td>
<td>Year 2: Tutorial participation 10%, Assignment 1: Short essay 50% (Due April 4)</td>
<td>Analysis of the assignment topic/theme, understanding terminology and disciplinary discourse (Film language) and developing a deeper understanding of the key concepts introduced in the topic/text.</td>
<td>Collaboration between the MFT Academic Skills Coordinator (ASC), Service Learning, SLSS &amp; SLT to Integrate A&amp;I</td>
<td>2.1: A capacity for critical, conceptual and reflective thinking.</td>
</tr>
<tr>
<td></td>
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<td></td>
<td>Xuelin Zhou: Students enrolled: 48</td>
<td>Year 2: Research essay 50% (Due April 4).</td>
<td>Year 3: Data Presentation &amp; Termini participation 20% (Assignment 2)</td>
<td>Formulating the thesis statement. Finding additional assignment literature. Articles, books, and journal articles.</td>
<td>2.2: An ability to access, identify, organise and communicate knowledge effectively in both written and spoken English and/or other languages.</td>
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<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Year 2: Research essay 50% (Due April 4).</td>
<td>Year 3: Assignment 2: Research essay 50% (Due April 25).</td>
<td>Articles, books, and journal articles.</td>
<td>2.5: An ability to make appropriate use of advanced information and communication technologies.</td>
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<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Year 2: Research essay 50% (Due April 4).</td>
<td>Year 3: Assignment 2: Research essay 50% (Due April 25).</td>
<td></td>
<td></td>
<td>2.6: An ability to accept, evaluate, and utilise information effectively in a stochastic and non-linear environment.</td>
</tr>
<tr>
<td>Facet of Inquiry</td>
<td>Level 1</td>
<td>Level 2</td>
<td>Level 3</td>
<td>Level 4</td>
<td>Level 5 (open)</td>
<td></td>
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<tr>
<td>A. Students embark on inquiry and so determine a need for knowledge/understanding</td>
<td>Analysis of the assignment topic/theme/task FTVM 100, FTVM 101, FTVM 110, FTVM 215, FTVM 211/309, FTVM 219/326, FTVM 227/329</td>
<td>Formulate a thesis statement FTVM 215, FTVM 212/309, FTVM 219/326, FTVM 227/329</td>
<td>Students research independently at the level of a closed enquiry and require some structure and guidance</td>
<td>Formulate own research question (Year 3) FTVM 339, FTVM 221/315, FTVM 219/326</td>
<td>Self-determined guidelines</td>
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</tr>
<tr>
<td>B. Students find/generate needed information/data using appropriate methodology</td>
<td>Finding literature FTVM 100, FTVM 101, FTVM 110</td>
<td>Understand and apply information search process FTVM 100, FTVM 101, FTVM 110</td>
<td>Finding literature - “Too few”/“Too many” scenarios FTVM 215, FTVM 211/309, FTVM 221/315, FTVM 219/326, FTVM 227/329</td>
<td>Generate questions/aims/hypotheses</td>
<td></td>
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</tr>
<tr>
<td>C. Students critically evaluate information/data and the process to find/generate this information/data</td>
<td>Selection and critical evaluation of literature/information FTVM 100, FTVM 101, FTVM 110</td>
<td>Position paper FTVM 213/324, FTVM 216/302</td>
<td>Literature review Close textual analysis of a film scene FTVM 215, FTVM 211/309, FTVM 219/326, FTVM 227/329</td>
<td>Analytical commentaries FTVM 210/325</td>
<td>Collect self-determined data &amp; information from self-selected sources based on self-structured guidelines</td>
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</tr>
<tr>
<td>D. Students organise information collected or generated</td>
<td>Referencing using recommended referencing style(s) - MLA FTVM 100, FTVM 101, FTVM 110, FTVM 215, FTVM 211/309, FTVM 219/326, FTVM 227/329</td>
<td>Literature review FTVM 213/324, FTVM 216/302</td>
<td>Reading skills - critical analysis of the key concepts, theories and ideas from literature FTVM 221/315, FTVM 219/326, FTVM 227/329</td>
<td>Evaluate information &amp; reflects on inquiry process using self-generated criteria based on expertise &amp; literature</td>
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<tr>
<td>E. Students synthesise, analyse, and apply new knowledge</td>
<td>Career awareness - understanding of professional attributes FTVM 210/325</td>
<td>Film review - critical, thematic, stylistic and cultural analysis - media analysis FTVM 213/324, FTVM 216/302, FTVM 224/319</td>
<td>Research essay FTVM 202/307</td>
<td>Formulating well-structured arguments FTVM 339, FTVM 221/315, FTVM 219/326, FTVM 227/329</td>
<td>Organise information/data using student (self) determined structures and management of processes.</td>
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<tr>
<td>F. Students communicate knowledge and the process used to generate it with an awareness of ethical, social and cultural issues</td>
<td>Students apply appropriate essay structure model FTVM 100, FTVM 101, FTVM 110, FTVM 211/309, FTVM 219/326, FTVM 227/329</td>
<td>Presentation skills FTVM 213/324, FTVM 216/302, FTVM 210/325</td>
<td>Writing skills for social media - blogs FTVM 210/325</td>
<td>Analyse &amp; create information/data to fill student (self) identified gaps or extend knowledge.</td>
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</tbody>
</table>
Identifikacija predmeta/kurseva sa nedostatkom elemenata istrazivanja/ istrazivckh zadataka za studente I prilike za razvoj istrazivackih sposobnosti/razumevanja procesa

| Identified opportunities for developing RSDF level 3 & 4 facets of inquiry |
|---|---|---|---|---|---|---|
| Focus on independent research/writing/critical analysis work – courses identified based on curriculum mapping | Film review - critical, thematic, stylistic and cultural analysis – media analysis (RSDF level 3) | Position paper (RSDF level 4) | Analytical commentaries (RSDF level 3) | Presentation skills (RSDF levels 2 & 3) | Career awareness - understanding of professional attributes (RSDF levels 1 & 2) | Writing skills for social media – blogs (RSDF level 3) | Literature review (RSDF level 4) | Research essay & understand research process (RSDF level 4) |
| 213/324 & 216/302 | X | X | X | X | X | X | X | X |
| FTVMS 224/319 | X | X | X | X | X | X | X | X |
| FTVMS 202/307 | X | X | X | X | X | X | X | X |
| FTVMS 210/325 | X | X | X | X | X | X | X | X |
| FTVMS 225 | X | X | X | X | X | X | X | X |
Pacific Studies (Year 3): Guiding students to independent research. RSDF Levels 3-5.

<table>
<thead>
<tr>
<th>RSDF Research Facets</th>
<th>Research skills</th>
<th>Proficient</th>
<th>Mastery</th>
<th>Exceed Expectations</th>
<th>University Graduate Profile</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>RSDF levels 3-5</td>
<td>0-3</td>
<td>4-7</td>
<td>8-10</td>
<td>3.3 Self-discipline and an ability to plan and achieve personal and professional goals.</td>
</tr>
<tr>
<td>Embark &amp; Clarify</td>
<td>Generate aims, questions and</td>
<td>Assignment question has been well explored, aims expressed and relevant research questions addressed.</td>
<td>Good interpretation of assignment task. Aims clearly expressed and engaging research questions adopted. Draws on a good range of academic evidence as support.</td>
<td>Assignment question has been thoroughly explored. Independent interpretation of assignment task. Original aims presented and linked to challenging research and issues. Draws on a comprehensive range of academic evidence.</td>
<td>1.2 An understanding and appreciation of current issues and debates in the major fields of knowledge studied.</td>
</tr>
<tr>
<td>(Curious)</td>
<td>approaches within structured</td>
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<td></td>
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<tr>
<td>guidelines.</td>
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<tr>
<td>Find &amp; Generate</td>
<td>Self-select appropriate sources</td>
<td>Includes resources beyond reading list. Identifies methodology.</td>
<td>Effectively identifies resources beyond reading list. Chosen methodology well suited to selected research material.</td>
<td>Varied resources beyond the reading list identified and effectively categorized. Chosen methodology illustrates originality and maps directly to research resources selected.</td>
<td>2.5 An ability to recognise when information is needed and a capacity to locate, evaluate and use this information effectively. 2.4, 2.9</td>
</tr>
<tr>
<td>(Determined)</td>
<td>from a variety of sources (</td>
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<tr>
<td></td>
<td>databases). Choose methodology</td>
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<tr>
<td></td>
<td>based on structured guidelines.</td>
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<tr>
<td>Evaluate &amp; Reflect</td>
<td>Assess the credibility of</td>
<td>Satisfactory assessment of the credibility of sources. Reflects on chosen methodology and research process developed. Intext</td>
<td>Good assessment of the credibility of sources. Insightful reflection on methodology and evaluation of research</td>
<td>Excellent assessment and evaluation of Information sources. Outstanding scholarly reflection and justification presented on</td>
<td>1.3 An understanding and appreciation of the philosophical bases, methodologies and characteristics of scholarship,</td>
</tr>
<tr>
<td>(Discerning)</td>
<td>sources and evaluate information.</td>
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<td></td>
<td>Reflect on chosen methodology</td>
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<tr>
<td></td>
<td>and the research process.</td>
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</tbody>
</table>
Zasto bas RSDF i primena

2. Dizajn predmeta/ predavanja, tutorijala i metoda ispitivanja/ ocjenjivanja (assignments) – koje sposobnosti (SKILLS) pored ZNANJA iz discipline/ predmeta
2. Effective communication

   (a) An advanced capacity to communicate ideas effectively in suitable formats to a range of audiences inside the field of study or discipline and to the wider community.
   (b) An advanced ability to communicate effectively using written and spoken English and/or Maori, or where appropriate, other languages.

3. General intellectual skills and capacities

   (a) An advanced capacity for critical, conceptual, and reflective thinking.
   (b) An advanced capacity to locate, contextualise, critically evaluate, synthesise, and use information effectively.
   (c) An advanced ability to analyse information, where relevant, using appropriate tools, technologies, and methods.
   (d) An advanced capacity for critical appraisal of relevant scholarly literature.
   (e) An advanced ability to initiate, design, conduct, sustain, and report research.
   (f) A strong willingness to seek continuous improvement in research skills and quality of research.
   (g) Interdisciplinary perspectives.
   (h) The self-awareness to identify one's professional, personal, and research skills, and the ability to market these appropriately in the employment market.
   (i) An understanding of career and professional development strategies.
   (j) The ability to work independently, as well as collaboratively and effectively with others, as appropriate.

4. Independence, creativity and learning

   (a) An intellectual openness and curiosity.
   (b) An advanced capacity for creativity and originality.
   (c) An advanced ability to identify, define, analyse, and solve problems in a flexible manner and the skill to adapt innovatively to changing environments.
   (d) An appreciation for ideas, discovery, and learning.
   (e) Self-discipline and an advanced ability to plan and achieve goals (personal and professional), including career advancement and identifying appropriate opportunities in the chosen field.

5. Ethical and social understanding

   (a) Personal, professional and intellectual integrity, and respect for the ethics of research and scholarly activity.
   (b) An awareness of local and global dimensions of intellectual, political, and economic activities.
   (c) An appreciation of human and cultural diversity and respect for the values of individuals and different cultural groups.
   (d) An awareness of the implications and potential of their research in terms of intellectual property and commercialisation.
Libraries and Learning Services

Subject knowledge
- Research methods: theoretical knowledge
- Research methods: practical application
- Information seeking
- Information literacy and management
- Languages
- Academic literacy and numeracy

Knowledge base (A1)
- Analyzing
- Synthesizing
- Critical thinking
- Evaluating
- Problem solving

Cognitive abilities (A2)
- Inquiring mind
- Intellectual insight
- Innovation
- Argument construction
- Intellectual risk

Analyzing and Critical thinking

Engagement, influence and impact
- The knowledge and skills to work with others and ensure the wider impact of research.

Domain D
- Communication methods
- Communication media
- Publication

Teaching
- Public engagement
- Enterprise
- Policy
- Society and culture
- Global citizenship

Health and safety
- Ethics, principles and sustainability
- Legal requirements
- IPR and copyright
- Respect and confidentiality
- Attribution and co-authorship
- Appropriate practice

Domain B
- Research governance and organisation
- The knowledge of the standards, requirements and professionalism to do research.

Domain C
- Professional conduct (C1)
- Research management (C2)
- Finance, funding and resources (C3)

Research strategy
- Project planning and delivery
- Risk management

Career management
- Continuing professional development
- Responsiveness to opportunities
- Networking
- Reputation and esteem

Domain A
- Personal qualities (B1)
- Professional and career development (B3)
- Self-management (B2)
- Preparing and prioritisation
- Commitment to research
- Time management
- Responsiveness to change
- Work-life balance

Personal effectiveness
- Enthusiasm
- Perseverance
- Integrity
- Self-confidence
- Self-reflection
- Responsibility

Enthusiasm

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3. The Doctoral Skills Programme at University of Auckland Library & School of Graduate Studies

- **15** different workshop titles
- **180** sessions per year
- taught by **40** Subject Librarians
- attended by **2000** doctoral candidates
Welcome to the Doctoral Skills Programme (DSP) Hub

From this site doctoral candidates can find information about the University of Auckland Doctoral Skills Programme (DSP) consisting of a compulsory induction Day and different workshop strands.
Moje istrazivanje...saznali smo – ne samo 'skills' sposobnosti, vec i razmena znanja, problema i resenja – potreba da uce jedni od drugih a ne od profesora...
U grupama – da li je moguce promeniti RSDF u vasem licnom radu (sa kolegama, istrazivackim timom, studentima…) i kako?
(5 -7 minuta)
Carol Collier Kuhlthau was the sole developer and researcher of the Information Search Process (ISP).

This model was developed from the findings of five studies and was intended to serve as a guide for designing instructional programs.

Kuhlthau’s Model, known as the Information Search Process (ISP), is one of the most highly cited works in Library and Information Science.
# Carol Kuhlthau’s Information Search Model (ISP)

<table>
<thead>
<tr>
<th>STAGES</th>
<th>Receive Assignment / Enrol in MA or PhD programme</th>
<th>Topic selection</th>
<th>Exploration Seeking focus</th>
<th>Focus formulation /is found</th>
<th>Information collection</th>
<th>Present Findings &amp; Assess research process</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>FEELINGS</th>
<th>UNCERTAINTY</th>
<th>OPTIMISM</th>
<th>CONFUSION</th>
<th>FRUSTRATION</th>
<th>DOUBT</th>
<th>SEARCH</th>
<th>READ</th>
<th>REFLECT</th>
<th>CLARITY</th>
<th>CONFIDENCE</th>
<th>EVALUATE</th>
<th>RELIEF</th>
<th>SATISFACTION</th>
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</thead>
</table>

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<tr>
<th>THOUGHTS</th>
<th>AMBIGUITY</th>
<th>INCREASED INTEREST</th>
<th>SPECIFICITY</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>ACTIONS</th>
<th>SEEKING RELEVANT INFORMATION</th>
<th>SEEKING PERTINENT INFORMATION</th>
</tr>
</thead>
</table>
Libraries and Learning Services

The PhD Process

PhD Stages
- Field of interest
- Possible topics
- Thesis proposal
- Pilot Study
- Data collection
- Data analysis
- Writing up

Thesis Stages
- Background theory
- Focal theory
- Data theory
- Contribution

Broad search — overview of literature
- Literature Review: Getting started workshop

Focused search — looking for specific information
- Literature Review: Targeting your research workshop

Search Tools
- Google Scholar
  - Articles & more
  - Open access
  - Theses & dissertations

Databases by subject, individual database search
BROAD SEARCH – OVERVIEW OF LITERATURE

*Literature Review: Getting started* workshop

Google Scholar
Articles & more
Open access
Theses & dissertations

Databases by subject

Focused search – looking for specific set of results -

*Literature Review: Targeting your research* workshop

Individual database search
SYSTEMATIC LITERATURE REVIEWS – the process
U grupama – da li je moguće promeniti C.C. Kuhlthau’s ISP u vasem licnom radu (sa kolegama, istrazivackim timom, studentima…) i kako? (5 -7 minuta)
Da li naucnici i istrazivacii mogu da postanu superstarovi?
Status ‘superstara’:

Documents by subject area

- Arts and Humanities (34.6%)
- Social Sciences (30.0%)
- Mathematics (5.2%)
- Computer Science (5.3%)
- Business, Management and Accounting (6.8%)
- Engineering (7.2%)
- Psychology (7.8%)
- Medicine (8.4%)
- Physics and Astronomy (14.4%)
- Other (29.8%)
Status ‘superstara’:

https://directory.auckland.ac.nz/people/profile/r-greenberg
Status ‘superstara’:

**Symplectic elements/ Research Outputs**

Status ‘superstara’:

Altmetrics, Biblioinformatics Service & Open access tools

http://www.library.auckland.ac.nz/biblioinformatics
‘Zivotni’ ciklus potataka istrazivanja

Koja će biti ‘sudbina’ podataka koje ste sakupili u toku istrazivanja kojim se trenutno bavite u narednih 10 godina?

Gde ih trenutno cuvate?
‘Zivotni’ ciklus podataka istrazivanja: data preservation & data sharing

- FigShare
- Open government data platform – India & http://www.ogpl.nic.in/
- Dataverse Network (Public Knowledge Project) – Harvard University
- Dryad data repository in scientific & medical research - US
- OPEN DATA REPOSITORIES (hosted by the School of LIS at Simmons College)
- Datacite
- UoA Research Data Management tools/guides/training

Koji je potencijalni problem?
VASA PITANJA