

Can Academic Analytics Tell Us How Libraries Impact Faculty Scholarly Research Productivity?

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VCU

VIRGINIA COMMONWEALTH UNIVERSITY

Libraries

FINDINGS

Libraries are vital to the research productivity of universities

Electronic resources have the power to improve research productivity and efficiency significantly and across a variety of disciplines

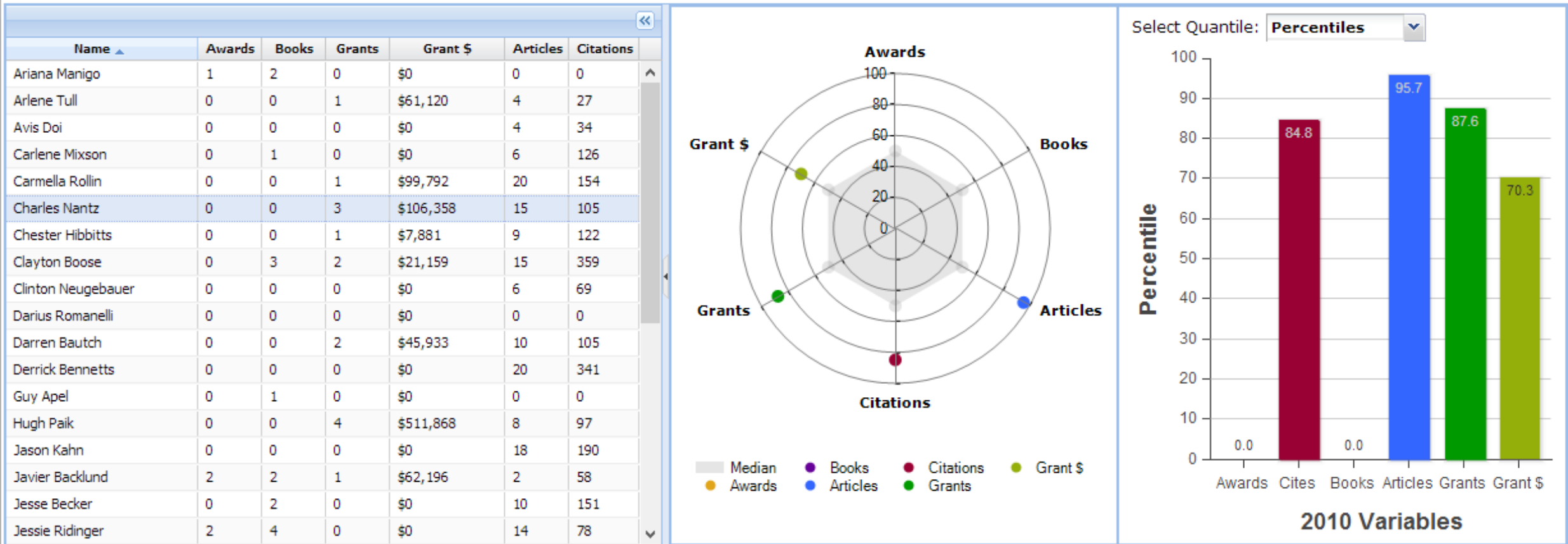
Print collections appear to remain especially relevant to scholarly production within the humanities

KEY QUESTIONS

Do universities produce more scholarship when they invest more in their libraries?

Are research communities more productive when they have access to a well-resourced library?

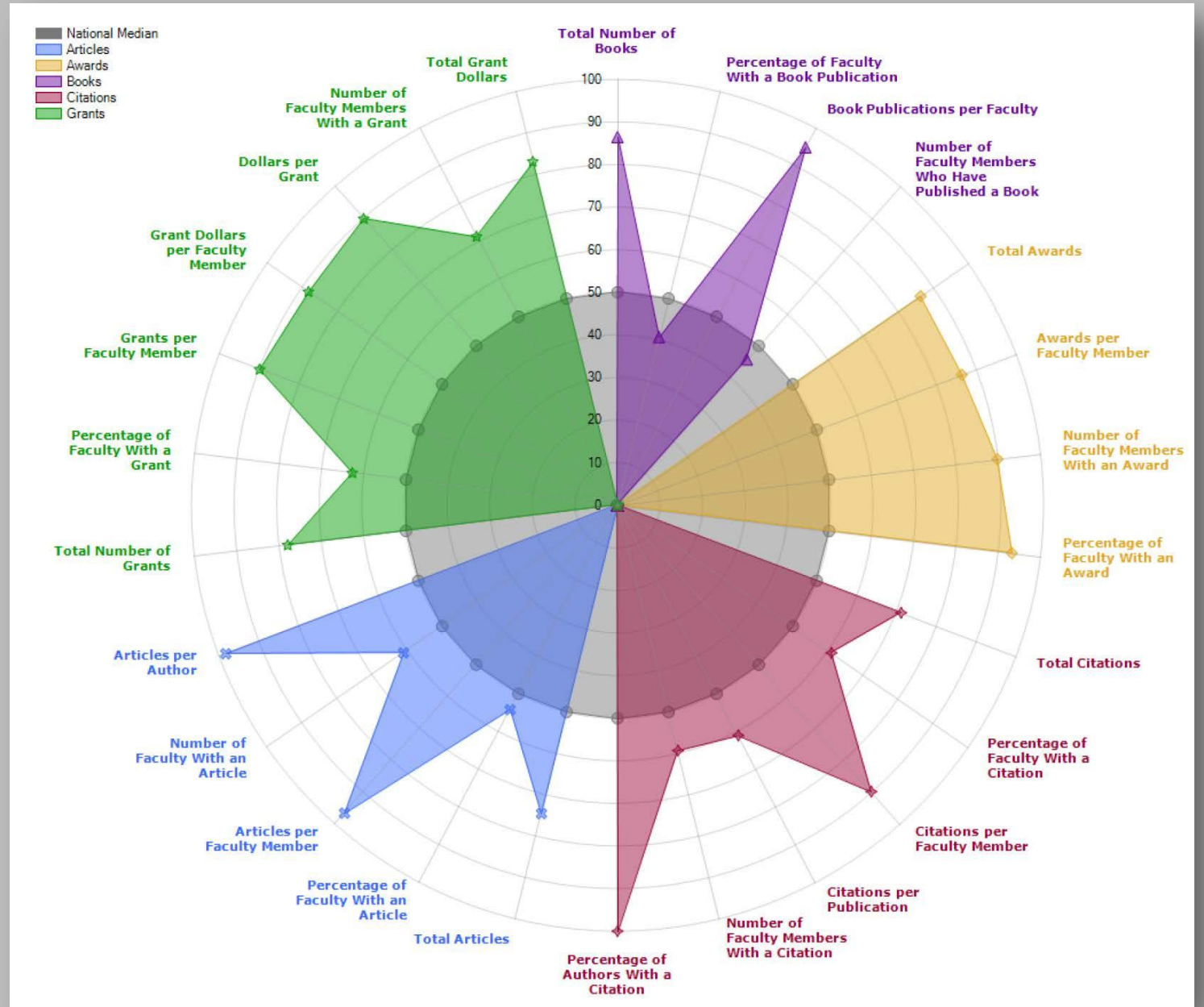
ACADEMIC ANALYTICS – FACULTY COUNTS



Names are not actual, for representation only

Academics Analytics screenshot. nd. *Academic Analytics*. 30-Jul-2014

THE FLOWER GRAPH: Program-Level Productivity in Academic Analytics



UNIVERSITY WORKS – Institutional Productivity in Academic Analytics

Institution	Faculty #	Books #	Articles #	Citations #	Awards #	Grants #	Grants \$	Conf Proc #
Name Removed	1478	975	7905	105664	365	1270 \$	206,214,306	1049
Name Removed	809	178	3716	30538	105	321 \$	42,126,796	414
Name Removed	1109	705	8269	146014	360	1104 \$	251,320,445	436
Name Removed	338	72	1407	14996	27	153 \$	17,919,927	167
Name Removed	706	440	5347	94389	455	905 \$	190,198,935	193
Name Removed	728	289	5507	77126	371	1097 \$	212,803,906	1548
Name Removed	745	192	6872	108779	175	907 \$	237,137,378	263
Name Removed	1779	1246	4571	59309	416	780 \$	140,170,275	326
Name Removed	675	168	3218	30557	85	427 \$	51,096,461	267
Name Removed	854	181	5592	65281	142	710 \$	121,622,510	274
Name Removed	1590	1263	14229	255036	1162	1795 \$	458,782,841	553
Name Removed	1483	1025	10654	172071	796	1636 \$	317,071,738	618
Name Removed	670	152	2418	42771	72	486 \$	80,837,859	383
Name Removed	1125	1027	12118	211376	670	1433 \$	316,025,050	398
Name Removed	960	643	8612	154870	279	886 \$	258,816,798	168
Name Removed	515	209	2561	25619	57	291 \$	58,660,218	225
Name Removed	910	524	5860	64272	183	608 \$	106,660,297	358
Name Removed	704	514	1982	24032	105	350 \$	64,708,133	362
Name Removed	515	288	1536	20595	143	277 \$	43,126,618	189
Name Removed	970	268	9028	125073	481	1560 \$	217,432,352	2004
Name Removed	590	267	2637	26002	70	222 \$	45,432,301	151
Name Removed	1507	1428	20787	581643	2022	2316 \$	798,486,088	413
Name Removed	1305	988	6372	74673	426	740 \$	122,599,932	188

VCU Academics Analytics Portal Screenshot. *Academic Analytics*. 30-Jul-2014

INSTITUTIONAL INPUTS

SCHOLARLY PROUDUCTIVITY OUTPUT

Library Characteristics

Measures from ARL/ACRL Survey:

- e.g. Total Library Expenditures
- Library Material Expenditures
- Personnel Expenditures
- Staffing Levels

Other Institutional Characteristics

Measures from Academic Analytics and IPEDS:

- e.g. Number of Faculty
- Number of Grants
- Research Expenditures
- Financial Strength
- PhDs Awarded

Number of
Journal
Articles

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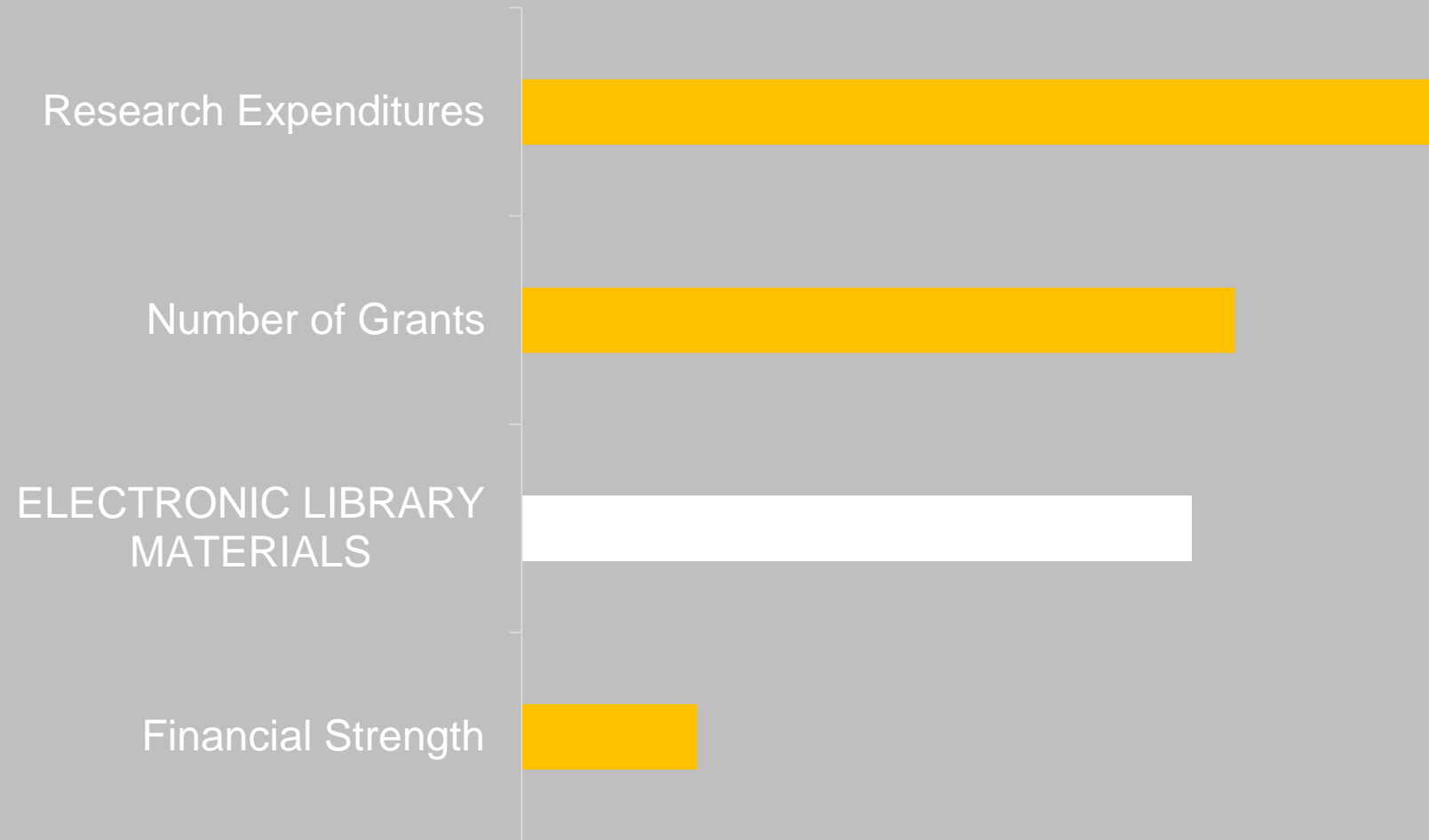
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Number of
Journal
Articles **per**
Faculty
Member

PREDICTORS OF SCHOLARLY PRODUCTIVITY

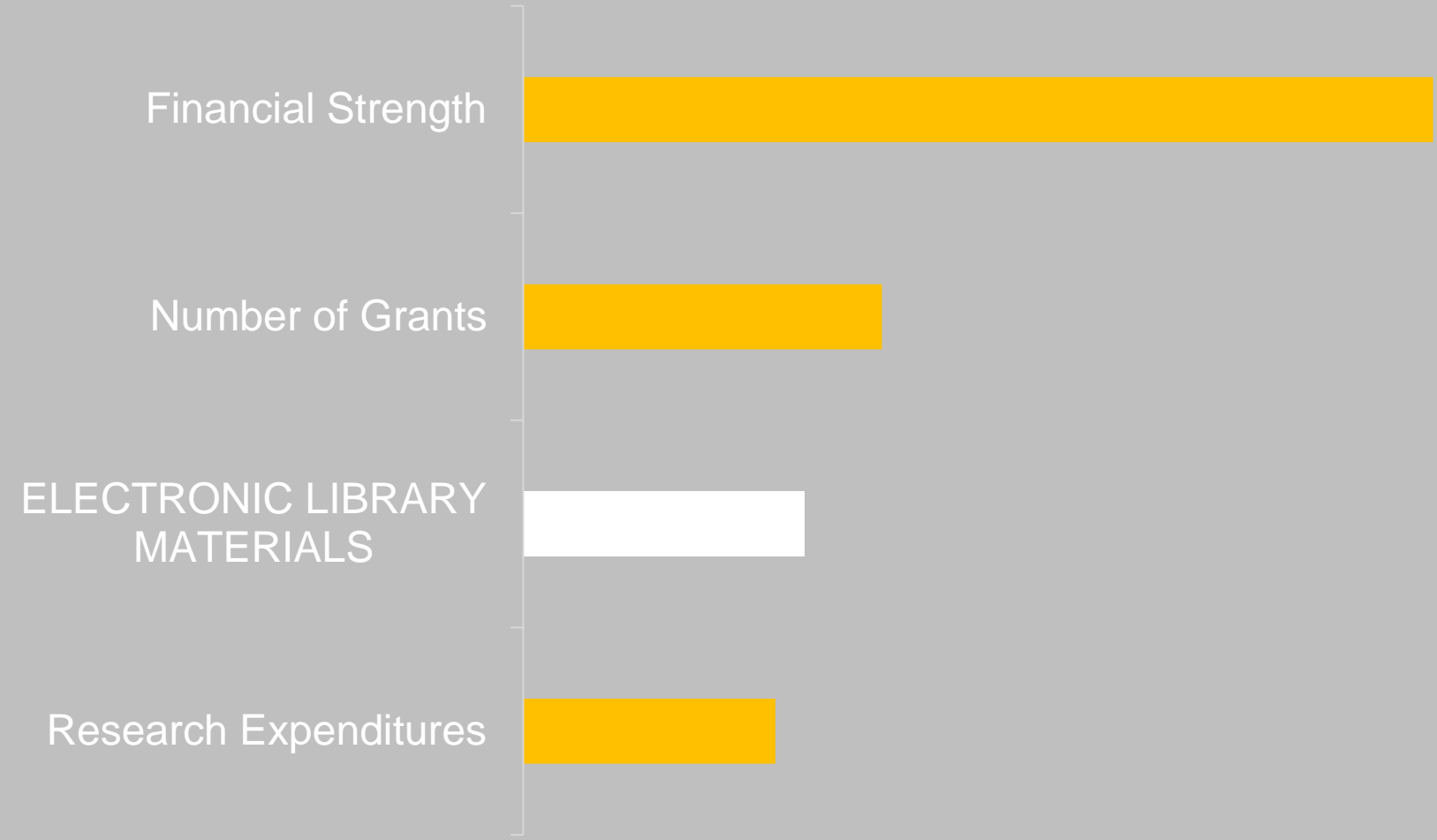
HEALTH AND LIFE SCIENCES



relative size of standardized coefficients (n=223, p<.05, adj. r-sq=.667)

PREDICTORS OF SCHOLARLY PRODUCTIVITY

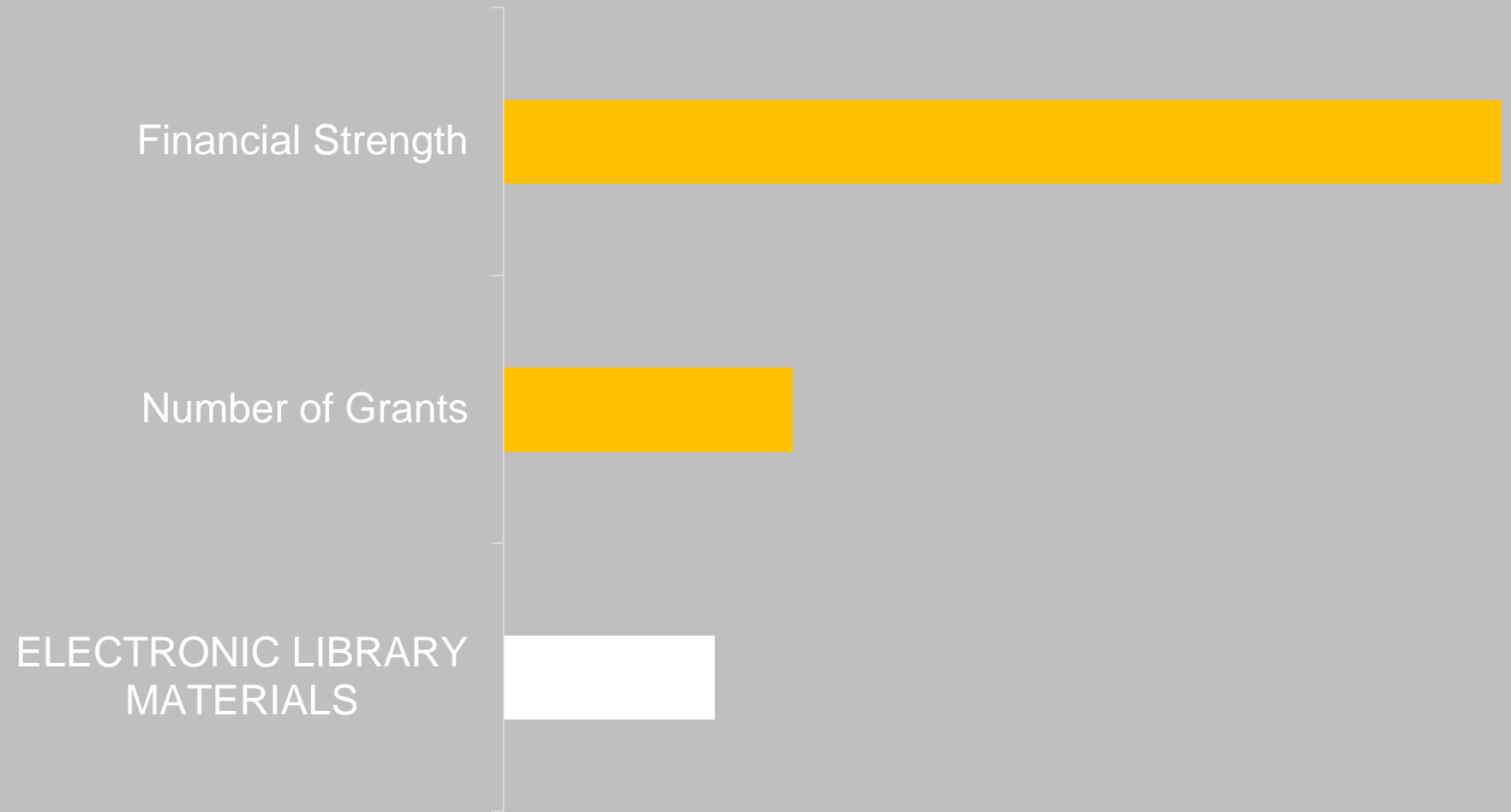
SOCIAL SCIENCES



relative size of standardized coefficients (n=178, p<.05, adj. r-sq=.566)

PREDICTORS OF SCHOLARLY PRODUCTIVITY

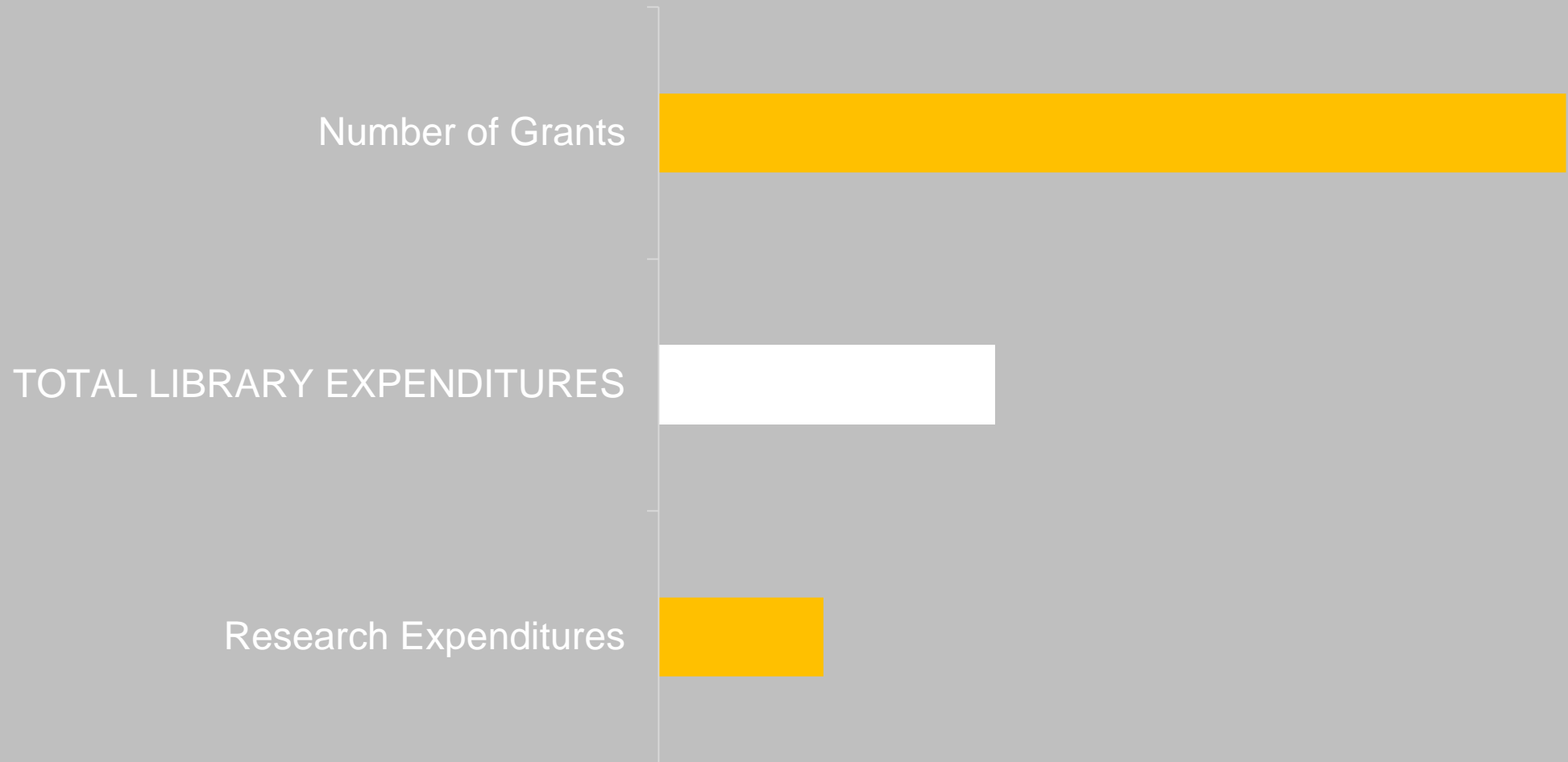
PSYCHOLOGY



relative size of standardized coefficients (n=168, p<.05, adj. r-sq=.520)

PREDICTORS OF SCHOLARLY PRODUCTIVITY

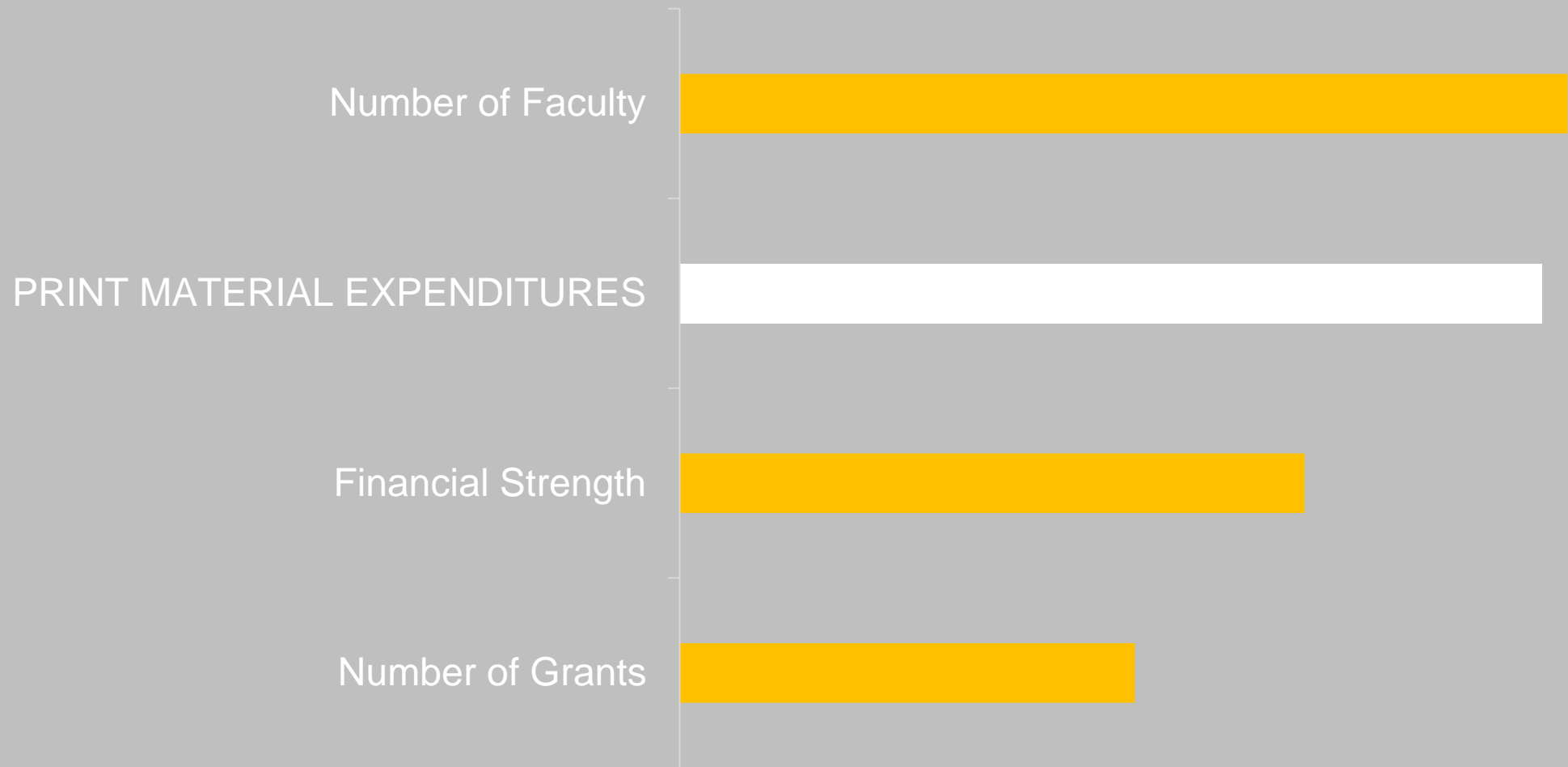
ENGINEERING



relative size of standardized coefficients (n=121, p<.05, adj. r-sq=.478)

PREDICTORS OF SCHOLARLY PRODUCTIVITY

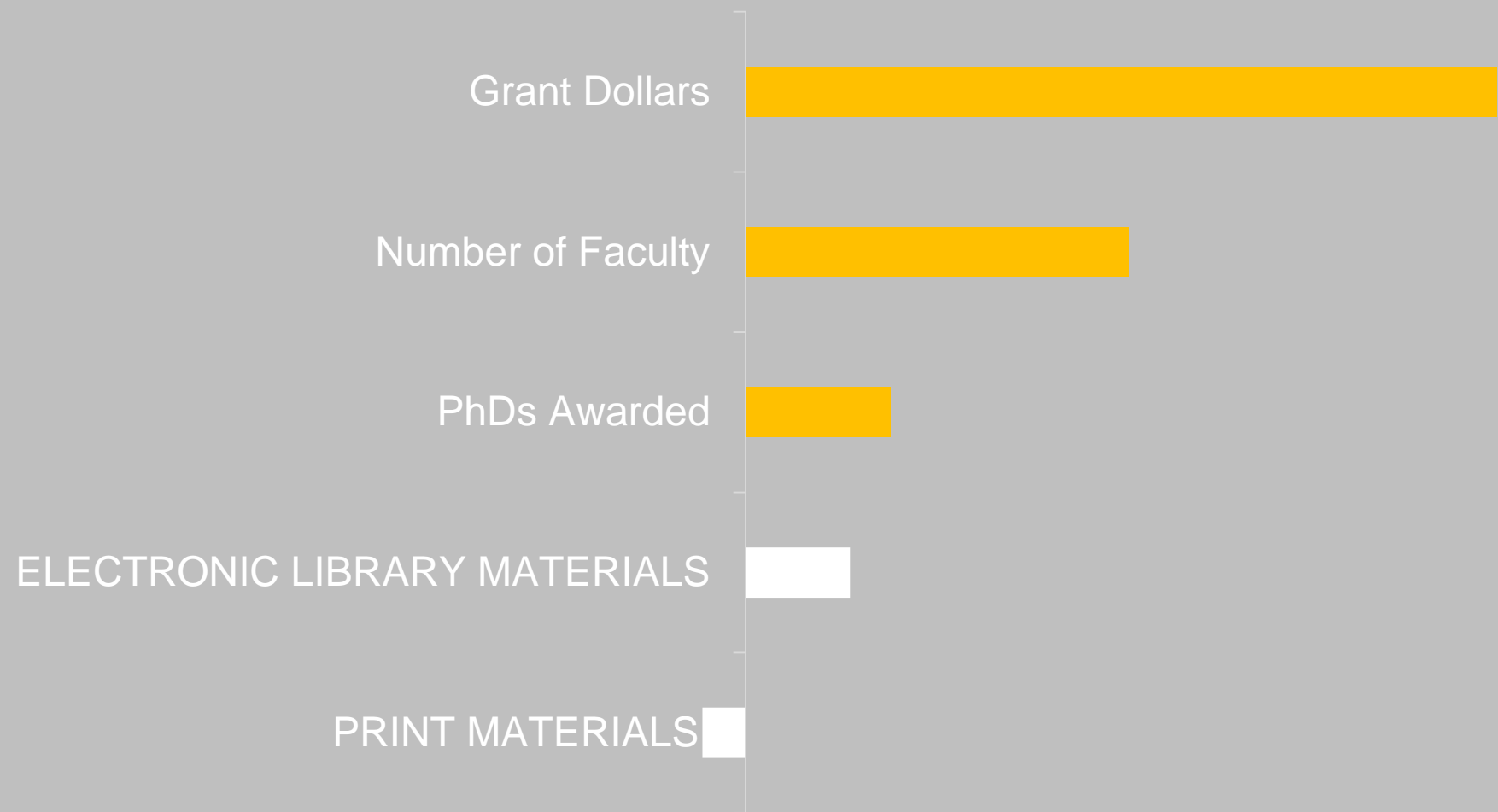
ART HISTORY



relative size of standardized coefficients (n=63, p<.05, adj. r-sq=.503)

PREDICTORS OF SCHOLARLY PRODUCTIVITY

US DOCTORAL INSTITUTIONS



LibQUAL+® CORROBORATES FINDINGS

“DESIRED MEAN” SCORES RELATED TO ELECTRONIC MATERIALS

2013 FACULTY OF ARL MEMBER INSTITUTIONS:

“Making electronic resources accessible from my home or office” (IC-1, 8.42)

2013 FACULTY OF ARL MEMBER INSTITUTIONS (local questions):

“Having comprehensive electronic resources” (8.32)

“The right mix of electronic content” (8.31)

2012 FACULTY OF AAHSL

“The electronic information resources I need” (IC-4, 8.51)

“Making electronic resources accessible from my home or office” (IC-1, 8.47)

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