# Characterization of Legal Psychology through psychology journals included in Criminology & Penology and Law categories of Web of Science

Francisco González-Sala<sup>1\*</sup>, Julia Osca-Lluch<sup>2</sup>, Francisco Tortosa Gil<sup>1</sup> and María Peñaranda Ortega<sup>3</sup>

1 University of Valencia (Spain). 2 INGENIO (CSIC-UPV), University Politécnica of Valencia (Spain). 3 University of Murcia (Spain).

**Título:** Caracterización de la Psicología Jurídica a través de las revistas de psicología incluidas en las categorías Criminology & Penology y Law de la Web of Science.

Resumen: El objetivo del presente trabajo es conocer los aspectos más relevantes que caracterizan a la Psicología Jurídica contemporánea a través del estudio de las revistas de la WoS en los años 2009 y 2014 relacionadas con esta área de la Psicología. El número de publicaciones seleccionadas es de 16, principalmente de USA e Inglaterra. Los resultados apuntan a un aumento en el número de trabajos y de autores, una mayor colaboración y un crecimiento de los medianos productores. Existe una mayor presencia de hombres en los comités editoriales y como autores, destacando las figuras de T. Ward en 2009 y de A. Vrij en 2014. Según el análisis de las palabras clave los temas más relevantes en estos años son Crimen, Conducta, Mujer y Metaanálisis, siendo la tipología delictiva más estudiada la violencia sexual hacia niños y mujeres y la violencia de género.

Palabras clave: Psicología Jurídica; Web of Science; Bibliometría; Género; Temas de investigación.

Abstract: The objective of this work is to learn about the most relevant aspects that characterize contemporary Legal Psychology throughout the study of journals included in the WoS between the years 2009 and 2014 related with the area of Psychology. The number of selected publications is 16, mainly from the USA and Great Britain. The results show an increase in the number of works and authors, a greater collaboration and a growth in medium productors. It exists a major presence of men in editorial boards and as authors, outstanding the figures of T. Ward in 2009 and A. Vrij in 2014. According to the analysis of key words the most relevant themes during these years have been Crime, Conduct, Woman and Metanalysis, being sexual violence towards children and women and gender violence the criminal typology most studied.

**Key words:** Legal Psychology; Web of Science; Bibliometry; Gender; Research topics.

#### Introduction

Legal Psychology has been understood as the implementation of the science of psychology to Law and laws (Bartol and Bartol, 2005), although, as Arce (2005) points out it can develop theories and methodologies that not only affect the proceedings of the Law, but goes beyond that by addressing aspects of human behaviour related to criminal acts. According to Arce and Fariña (2013) this relationship between Psychology and Law would give rise to a great variety within Legal Psychology, although it is the one related to the scope and forensic antisocial and criminal behaviour which enjoys greater recognition (Davies, Hollin and Bull, 2008).

Since the first experiment that applied Legal Psychology with James McKeen Catell in 1893 until the present, Legal Psychology has gone through different phases. Between the years 1920 and 1940 it went through a quiet phase (Bartol and Bartol, 2005) in which lawyers assumed the role of psychologists, during the fifties psychologists were considered experts with their testimony becoming relevant in civil and criminal cases, and from the 1970s, Legal Psychology begins a rebirth as it starts to apply the ideas and contributions of Behaviouristic and Educational Psychology to the treatment of prisoners (Nicholas, 1995). In Spain, the 80s represent a stage of development (Fariña, Arce and Novo, 2005a) and of an official recognition of Legal Psychology (Urra, 2002). A decade later, the expansion stage starts, (Fariña, Arce and Novo, 2005b), being the first decade of the twenty-first cen-

tury where a period of new challenges is started (Arce and Fariña, 2011).

Legal Psychology has also been the object of study from the bibliometric field, providing information on its evolution through different bibliometric indicators, such as the scientific production in Spain (Arch, Pereda, Jarne-Esparcia, Andrés and Guàrdia-Olmos, 2010; Quevedo-Blasco, Ariza and Raya, 2012), contributions to the International Congress of Legal Psychology (Velasco, Amado and Arias, 2014) or, more recently, on evidence of facial recognition of emotions (Jeanneret, Oña, Rego, Vaiman and Pereno, 2015).

The main aim of this piece is to get to know the characteristics of Legal Psychology in the last five years through the analysis of the articles published in scientific journals included in the databases of the Web of Science (WoS) that have been classified in the thematic categories "Criminology & Penology" and "Law", along with some of the categories of existing psychology in this database. It will analyze the magazines, the number of authors, the most prominent figures and the descriptions or keywords of articles which allow us to know the most relevant thematic research during 2009 and 2014. In addition, an analysis will be made of the team behind the journals in 2014 to uncover the most prominent figures within the field of research of Legal Psychology.

# Method

#### Materials and procedures

The search of my bibliographic material was conducted within the following databases; Journal Citation Index (JCR) and Social Science Citation Index (SSCI) both of which be-

\* Correspondence address [Dirección para correspondencia]: Francisco González Sala, Dpto. Psicología Evolutiva y de la Educación. Universidad de Valencia. Avda. Blasco Ibáñez, 21, 46019 46022 Valencia, (España). E-mail: juosllu@ingenio.upv.es long to the Web of Science (WoS) from the company Thomson Reuters and said search was carried out in May 2015. For the carrying out of the study, we firstly selected the journals included in the categories of Criminology & Penology and Law of the Journal Citation Report (JCR). Secondly, of all these journals, we selected those which were also included in any of the 11 thematic categories in which magazines are classified inside the JCR (SCI and SSCI) databases: Psychology, Multidisciplinary Psychology, Developmental Psychology, Educational Psychology, Social Psychology, Applied Psychology, Clinical Psychology, Mathematical psychology, experimental psychology, Biological Psychology and Psychology Psychoanalysis. The total number of journals that met these requirements was 16. Subsequently, we selected the editorial committees of these journals, and carried out a search of the articles included in these in the years 2009 and 2014.

The records retrieved and selected were included in a relational database, to facilitate the processing of the data. We equalized the variants that made little difference, such as the names of the authors, the members of the editorial committees and institutions. After completing the work of standardization of the names of the authors and the institutions, we proceeded to unify the different variants that exist in the selected journals to indicate the "role" played by the authors in their various committees or management teams. Lastly we went on to the analysis of the selected variables and their corresponding interpretations.

#### Variables

The variables that became object of study were: *Journal*, including quartile, country of editing and indexing field within psychology. *Editorial teams*, total number of members, all of them irrespective of whether they appear in more than one editorial team, and number of actual members, counting each researcher only once. *Authors*, counting the number of researchers, the number of articles and the number of signatures, differentiating between big, medium and small producers. *Gender*, defined by the categories of man and woman. *Descriptors*, defined by the key words of the articles.

# Analysis

To obtain the indicators we have used a system of full recount, by assigning the same value to each of the authors or institutions that have participated in the work. We recounted frequencies, calculated percentages and  $\chi 2$  y T tests to determine the existence of significant differences with the variables analysed. All of these inquiries were carried out using the statistical package SPSS 22.

#### Results

# Characteristics of the journals that were our object of study

The number of journals that related to Legal Psychology included in the year 2014 in the JCR database was 16. Some of these journals were included in different thematic categories: 13 were included in the category of Criminology & Penology, 6 in the category of Law and 3 magazines are classified in both categories. Simultaneously, these journals were also included in the 4 categories in Psychology (Multidisciplinary Psychology, Applied Psychology, Clinical Psychology and Social Psychology).

Table 1 shows the relationship between the Legal Psychology journals included in the WoS database. In it you can see the title of the journal, its country of publication, thematic areas, its impact factor in the year 2014 and the position it holds in the WoS in the Criminology & Penology categories where the total number of magazines was 55, and Law with a total of 140 magazines, and in the different categories of Psychology. Looking at the relation between the country of publication, 82% of journals are edited in the United States (8 magazines) and in the United Kingdom (5 magazines). The remaining 18 per cent of publications are issued in Australia, Spain and the Netherlands, countries which only publish one magazine each. In all the magazines, the language of publication is English.

## Members of staff of the journals and authors most relevant in the current field of Legal Psychology

With the purpose of identifying the key figures in the field of research of Legal Psychology in the years 2009 and 2014 we have carried out an analysis of the researchers that were part of the staff of the journals studied, as well as the authors who have published many pieces collected in the WoS databases

Looking at the composition of the editorial teams in the psychology journals included in the areas of Criminology & Penology and Law in the JCR of 2014, the total number of members is 658, although the actual number of members is 553, as there are researchers who are part of the committees of several journals. This means that two members are located in five editorial committees, 6 members in four committees, 16 members in three committees, 47 in two committees and 482 in a single committee. Table 2 provides us with information about the members that are part of 5 and 4 editorial committees of Legal Psychology magazines during the year 2014, together with the institution and country to which they belong and the title of the journal.

Table 1. Relationship between the journals included in the categories of Criminology & Penology, Law and Psychology.

Journal	Edition	Criminology	Low	Field of Psychology	
Journal	Country	& Penology Law		Tield of Fsychology	
Aggression and Violent Behaviour	England	10		Multidisciplinary (32 de 129)	
Behavioral Sciences & the Law	England		33	Applied (32 de 76)	
Criminal Justice and Behavior	USA	13		Clinical (69 de 119)	
International Journal of Offender Therapy and Comparative Criminology	USA	24		Applied (43 de 76)	
Journal of Forensic Psychology Practice	USA	48		Multidisciplinary (108 de 129)	
Journal of Interpersonal Violence	USA	18		Applied (38 de 76)	
Journal of Investigative Psychology and Offender Proffing	England	31		Applied (53 de 76)	
Law and Human Behavior	USA			Social (17 de 62)	
Legal and Criminological Psychology	England	14	26	Multidisciplinary (46 de 129)	
Psychiatry, Psychology and Law	Australia	45	91	Multidisciplinary (103 de 129)	
Psychology of Violence	USA	8		Clinical (34 de 119)	
Psychology, Crime & Law	England	22	48	Multidisciplinary (63 de 129)	
Psychology, Public Policy, and Law	USA		30	Multidisciplinary (48 de 129)	
European Journal of Psychology Applied to Legal Context	España		32	Multidisciplinary (51 de 129)	
Sex Abuse Journal Research Treatment	Netherlands	9		Clinical (40 de 119)	
Deviant Behavior	USA	25		Social (48 de 62)	

Table 2. Members belonging to a greater number of editorial committees of Legal Psychology journals of the WoS 2014.

Member, Country & Institution	Journals
Vrij Alder (UK)	-Legal and Criminological Psychology; - Journal of Investigative Psychology and Of-
Portsmouth University	fender Proffing; - Law and Human Behavior; - Psychology, Crime & Law; - Psy-
•	chology, Public Policy, and Law
Tony Ward (New Zeland) Victoria University of Wel-	-Aggression and Violent Behaviour; - Legal and Criminological Psychology; - Psy-
lington	chology, Crime & Law; - International Journal of Offender Therapy and Compara-
	tive Criminology; - Sexual Abuse a Journal of Research and Treatment
van Koppen, Peter J. (The Netherlands) Amsterdam	-Psychology, Crime & Law; - Journal of Investigative Psychology and Offender
Univ., Maastricht University & Netherlands Institute	Proffing; - The European Journal of Psychology Applied to Legal Context; - Psychi-
for the Study of Crime and Law Enforcement	atry, Psychology and Law
Randall T. Salekin (USA) University of Alabama	-Law and Human Behavior; - Psychiatry, Psychology and Law; - Psychology, Public
	Policy; - Law, Criminal Justice and Behavior
Heilbrun, Kirk (Canadá)	-Behavioral Sciences and the Law; - Criminal Justice and Behavior; - Law and Hu-
Drexel University	man Behavior; - Psychology, Public Policy, and Law
J. Thomas Grisso (USA) University of Massachusetts	-Behavioral Sciences and the Law; - Criminal Justice and Behavior; - Law and Hu-
	man Behavior; - Psychology, Public Policy, and Law
Devon Polaschek (New Zeland) Victoria University	-Criminal Justice and Behavior; - Legal and Criminological Psychology; - Psychology,
of Wellington	Crime & Law; - Sexual Abuse a Journal of Research and Treatment
Theresa A. Gannon (UK) University of Kent	-Aggression ad Violent Behaviour; - International Journal of Offender Therapy and
	Comparative Criminology; - Psychology, Crime & Law; - Sexual Abuse a Journal of
	Research and Treatment.

When analysing the relationship of authors who have published in Legal Psychology magazines through the category of gender, it is noted that 365 (66%) were men (446 signatures, 67.8%) and 188 (34%) are women (212 signatures, 32.2%). In determining whether there were differences in regards to gender in relation to the number of magazine committees, there was a statistically significant difference, t(504.267) = -2.079, p = .038, being the males the ones who were in a greater number of committees (M = 1.22; dt = .622) when compared to women (M = 1.13; dt = .432). Among the members who form part of 4 and 5 committees there are 8 men (87.5%) and one woman (12.5%), forming part of three committees, 12 were men (75%) and 4 were female (25%), in two committees, 34 were men (72.3%) and 13 women (27.7%) and in a single committee 312 men (64.7%) and 170 women (35.3%).

The members of these editorial teams work in institutions belonging to 27 countries. It should be noted that the women develop their work in institutions belonging to 12 of these countries (USA, UK, Spain, Canada, Australia, Switzerland, The Netherlands, Israel, Hong Kong, Italy, New Zealand and Singapore), while men do in the institutions of 26 countries.

Among the countries with the largest number of members in the editorial committees, the distribution by gender is as follows: United States 236 (64%) men and 133 (36%) women, United Kingdom 27 men (56.3%) and 21 women (43.8%), Canada 33 men (70.2%) and 14 women (29.8%), Australia 12 men (63.1%) and 7 females (36.9%) and Spain 11 men (84.6%) and 2 females (15.4%).

In the year 2009 the number of papers published in WoS journals related to Legal Psychology was 644, of whom 576 were articles and reviews, with 1400 authors and a total of

1582 signatures. During the year 2014, the number of papers was 899, of which 810 were articles and reviews, with 2109 authors and with a total of 2488 signatures. The rate of growth in the number of papers published between 2009 and 2014 is 28.4%.

An important indicator connected to authorship, which measures the degree of collaboration between the authors is the index of signatures to work. It is estimated by determining the average number of authors who sign each published work. The index of signatures to work of the year 2009 in Legal Psychology was 2.2 and the year 2014 was 2.8.

The authors can be grouped into three levels of productivity, large producers (in our case, more than 5 articles), medium-sized producers (between 2 and 5 articles) and occasional authors or casual (authors of a single article). As is reflected in Table 3 there is a greater number of high producing authors in the year 2009, while in 2014 there has been an increase in the number of medium-sized producers

compared to the year 2009. These differences were found to be statistically significant  $\chi$ 2=19,281, gl=2, p>.000,  $\Phi$  =.074.

**Table 3.** Frequencies and percentages according to the level of productivity of papers in Legal Psychology in the years 2009 and 2014.

Year/	Level of	Small	Medium-sized	Large pro-	Total
Produ	activity	Producers	producers	ducers	
2009	F(x)	1282	114	4	1400
	% in the year	91.6	8.1	0.3	100
	% producer	41.0	30.3	80.0	39.9
2014	F(x)	1846	262	1	2109
	% in the year	87.5	12.4	0.1	100
	% producer	59.0	69.0	20.0	60.1

Tables 4 and 5 include the authors with the highest number of publications about Legal Psychology during the years 2009 and 2014 in the WoS databases. In the year 2009 a prominent figure is the one of T. Ward (Victoria University Wellingtond, New Zealand) with 9 articles, and in the year 2014 the figure of Aldert Vrij (University of Portsmouth, England) again with 9 articles.

Table 4. Authors with the greatest production of articles and reviews on the WoS (2009).

Tubic Williams with the Steatest produc		
Authors	Articles	Institutions
Ward, Tony	9	Victoria Univ. Wellington, New Zeland
Beaver, Kevin M.	7	Florida State Univ. USA
Howells, Kevin	7	Univ. Nottingham, England
Gannon, Theresa A.	6	Univ. Kent, England
Beech, Anthony R.	5	Univ. Birmingham, England
Authors with 1 articles		

Birgden, Astrid (Deakin Univ. Australia); Daffern, Michael (Univ. Nottingham, England); Day, Andrew (Deakin Univ. Australia); Delisi, Matt (Iowa State Univ. USA); Dempsey, Julie. L. Carleton Univ. Canada); Ferguson, Christopher. J. (Texas A&M Int Univ. USA); Freckelton, Ian, Q.C. (Monash Univ. Australia); McMurran, Mary (Univ. Nottingham, England); Perlin, Michael L. (New York Law Sch, USA); Pozzulo, Joanna D. (Carleton Univ. Canadá); Walters, Glenn. D. (FCI Schuylkill, USA).

Table 5. Authors with the greatest production of articles and reviews on the WoS (2014).

Authors	Articles	Institutions	
Vrij, Aldert	9	Portsmouth, Univ. England	
Bogaerts, Stefan	5	Tilburg Univ. Netherlands	
Day, Andrew	5	Deakin Univ. Australia	
Edens, John F.	5	Texas A&M Univ. USA	
Freckelton, Ian Q.C.	5	Univ. Melbourne, Australia	
Lamb, Michael E.	5	Univ. Cambridge, England	
Neal, Tess M.S.	5	Univ. Alabama, USA	
Vaughn, Michael G.	5	St Louis Univ. USA	
Vitacco, Michael J.	5	Georgia Regents Univ. USA	

Beaver, Kevin M. (Florida State Univ. USA); Blais, Julie (Carleton Univ. Canadá); Boccaccini, Marcus, T. (Sam Houston State Univ. USA); Boutwell, Brian B. (St Louis Univ. USA); Bowen, Erica (Coventry Univ. England); Brodsky, Stanley L. (Univ. Alabama, USA); Cramer, Robert J. (Sam Houston State Univ. USA); Daffern, Michael (Univ. Nottingham, England); DeMatteo, David (Drexel Univ. USA); Gannon, Theresa A. (Univ. Kent, England); Lambert, Eric G. (Wayne State Univ. USA); Miller, Laurence (Royal Palm Med Ctr. USA); Murrie, Daniel C. (Univ. Virginia, USA); Ogloff, James R.P. (Monash Univ. Australia); Powell, Martine B. (Deakin Univ. Australia); Salas-Wright, Christopher.P. (Univ. Texas Austin, USA); Shepherd, Stephane M. (Monash Univ. Australia); Skeem, Jennifer L. (Univ. Calif Berkeley, USA), Stams, Geert Jam J.M. (Univ. Amsterdam, Netherlands).

Considering the large number of article writers in the years 2009 and 2014 relevant figures like Beaver, Kevin M., Freckelton, Ian Q.C., Gannon, Theresa A., Daffern, Michael, Day and Andrew stand out appearing to be some of the most important producers in the two years. Also, stand-

ing out, figures like Vrij, Aldert the largest producer of work in 2014 as the author with the most presence in magazine editorial committees and Ward, T. as the largest producer of work in 2009, being present in five magazine editorial committees

Characteristics of the investigation into Legal Psychology through the study of descriptors and/or keywords.

Knowing the evolution and the defining characteristics of Legal Psychology, implies analysing the descriptors or keywords used by the authors in their articles and reviews, which provide information on what issues have more relevance in this discipline. In this regard, it is interesting to know what terms are most used and what disorders have aroused greater interest among researchers.

When we analyse the descriptors or keywords we note that in the two studied years, 2009 and 2014, these descriptors are very similar, giving a match of four of the five indicators that are used with most frequency, these being are Metaanalysis, Crime, Behavior and Women (see Table 6).

Table 6. Descriptors used in the articles published in the years 2009 and 2014 in WoS Legal Psychology journals

Descriptors 2009	F(x) 2009	Descriptors 2014	F(x) 2014
Metaanalysis	50	Crime	72
Behavior	49	Behavior	70
Women	43	Violence	66
Crime	37	Metaanalysis	64
Offenders	37	Women	60
Domestic Violence	36	Risk	58
Recidivism	35	Offenders	58
Abuse	33	Abuse	55
Children	32	Aggression	51
Violence	31	Domestic Violence	51
Risk	31	Recidivism	49
Model	31	Antisocial-Behaviour	45
Aggression	25	Gender	43
Adolescents	25	Adolescents	40
Antisocial-Behavior	24	Prevalence	40

To find out what types of criminal behaviour have been the most studied within the field of Legal Psychology we conducted an analysis of all the abstracts of the articles in the analysed magazines from 2014 and 2009, given that the study of the descriptors made it difficult to know the typology of the offences. In the year 2014 the most frequent criminal typology was associated with sexual violence directed at women and children mainly, analysing its incidence, prevention, psychological characteristics of the sexual aggressors, programs of intervention with the victim and with the aggressors, recidivism, laws, among others, being the number of articles in relation to this issue of 77 (9.5%). The second type of offence most frequent, with 74 articles (9.1%), was the offence related to gender-based violence, addressing its prevalence at the general level, in the rural environment, in different countries depending on the race, with people with disabilities, evaluation of abusers, intervention with abusers, intervention with victims, programs of treatment and prevention, among others. Crime or criminal conduct appears in 50 articles (6.2%), other forms of criminal typologies contained in articles are homicide, murder, parricide in 19 articles, bullying in 13 articles, 12 related with new technologies and cyberbullying and others about terror-

In the year 2009 it is the crimes related to sexual violence which are most frequent, in particular 84 articles (14.6%) dealt with this issue within different fields, crime was present in 59 articles (10.2%), gender violence in 53 articles (9.2%), homicide, murder, matricide and parricide in 8 articles, 5 were related to terrorism and 4 with bullying.

## Discussion

The importance that Legal Psychology has gained over the last few years is an obvious fact if we consider its evolution not only at a scientific level but also in the applied field, remaining today as an inseparable part of Law and Criminolo-

In the scientific field, there has been an increase in the number of journals listed in the WoS, from 13 in 2009 to 16 in 2014, an increase in the number of scientific articles, from 576 in 2009 to 810 in 2014, and an increase in the number of researchers, 1400 authors in 2009 to 2109 authors in 2014. In these last five years, Legal Psychology as a discipline, has not remained stagnant in its growth. Not only has there been an increase in the number of journals, articles and authors, but it is also noted that in 2014 there were more signatures for work produced that in 2009, which points to larger research groups. In the year 2014 we observe an increasing number of small and medium-sized producers compared to 2009, this aspect reveals an increase in the number of groups and the strengthening of groups of experts.

Contemporary Legal Psychology is characterised by its multidisciplinary quality, proof of this is the large number of journals that belong to this category of Psychology in the WoS. This is evident if one considers the multitude of issues it addresses, as has been demonstrated by the number and diversity of the key words that define each scientific article, by the typologies of criminal or antisocial behaviour, where articles related mainly to sexual violence and gender-based violence stand out, with issues relating to new technologies and the cyberbullying and with terrorism seeming to have a growing interest among researchers.

In line with Arce (2005), the results of this study highlight the prevalence of the contributions of Clinical Psychology, Social Psychology and Applied Psychology to Legal Psychology, while, and after the analysis of the articles, mention should be made of the contributions, to a lesser extent, from other areas of Psychology, such as Developmental Psychology, Educational Psychology, Basic Psychology and Methodology, highlighting in the year 2014 the contributions of Psychobiology. Examples include articles as Eme, Robert's "Attention Deficit Hyperactivity Disorder: to mitigation of Criminal Responsibility?" published in the Journal of Forensic Psychology Practice, the work of Juan Antonio Becerra-García and Vincent Egan "Neurocognitive Functioning and Subtypes of Child Molesters: Poorer Working Memory Differentiates from Non-Incestuous Incestuous Offenders" published in the journal Psychiatry, Psychology and Law or the article "Civil Law and Neuroscience" by C. H. of Kogel, W. M. Schrama, and M. Smith in the journal Psychiatry, Psychology and Law, among others.

Legal Psychology also acquires international importance, proof of such is the large number of editing countries of journals included in the WoS, five countries in particular, in which the United States stands prominent, and the nationalities of the members of the editorial committees, who are of 27 different nationalities, giving rise to studies in different parts of the world, such as the works of Theresa S. Betancourt, Ryan K. McBain & Robert T. Brennan entitled "Trajectories of externalizing problems among war-affected youth in Sierra Leone: Results from a longitudinal study", the works of A. Kamimura, D. Bybee & M. Yoshihama "Factors Affecting Initial Intimate Partner Violence-Specific Health Care seeking in the Tokyo Metropolitan Area, Japan" or the works of A. Md. Hossain, N. S. Sumi, E. M. Haque & W. Bari "Consequences of Intimate Partner Violence Against Women on Under-Five Child Mortality in Bangladesh" among others, all published in 2014.

To speak of Legal Psychology in the past five years is to also do so of the most relevant figures in this discipline. Thus, in 2009 standing out as a major producer with 9 articles is Tony Ward (University of Wellington, New Zealand) and in 2014 Vrij Alder (Portsmouth University, England) with 9 articles, figures which are also the most represented in the editorial boards of the journals the WoS analysed, each of them being present in 5 editorial committees. Other important figures in the years 2009 and 2014 have been Beaver, Kevin M. (Florida State University, USA), Freckelton,

Ian Q.C. (University of Melbourne, Australia), Gannon, Theresa A. (University of Kent, England), Daffern, Michael (University of Nottingham) and Day, Andrew (Deakin University, Australia).

Legal Psychology is also characterized by a greater presence of men (66%) compared to women (34%) in regards to the composition of the editorial teams, and by the number of men and women among the large and medium-sized producers, with a greater presence of men.

The analysis of the articles leads us to define the topics that are most relevant at the present time within the field of Legal Psychology. In this aspect, the keywords most cited in 2009 and 2014 are Meta-analysis, Crime, Behaviour, and Women, terms which have been linked mainly to articles referring to sexual violence and gender-based violence, and gaining importance in the last year in relation to the subject of bullying, cyberbullying and internet-related crimes and computing.

While this work presents limitations, such as having not taken into consideration other magazines that may be publishing articles related to Legal Psychology, or that the study compares the characteristics of Legal Psychology of just two years, this article allows us to learn, through bibliometric techniques, the trends that characterize Legal Psychology in the field of research in recent years, bringing to our knowledge, in the words of Arce and Fariña (2012) parts of the new challenges that face this discipline in the twenty-first century.

#### References

- Andrews, D. A., Bonta, J. y Wormith, S. (2004). Manual for the Level of Service/Case Management Inventory (LS/CMI). North Tonawanda, NY: Multi-Health Systems.
- Arce, R. (2005). La construcción de la psicología jurídica en Europa y su estatus actual. En R. Abrunhosa y C. Machado (Eds.), Manual de psicología jurídica (pp. 103-114). Coimbra: Quarteto.
- Arce, R. y Fariña, F. (2012) Psicología social aplicada al ámbito jurídico. En A. V. Arias, J. F. Morales, E. Nouvilas y J. L. Rubio (Eds.), Psicología social aplicada (pp. 157-181). Madrid, España: Editorial Médica Panamericana.
- Arce, R. y Fariña, F. (2013). Psicología social aplicada al ámbito jurídico. En A. V. Arias, J. F. Morales, E. Nouvilas, y J. L. Martínez-Rubio (Coords.), Psicología social aplicada (pp. 157-181). Madrid, España: Editorial Médica Panamericana.
- Arch, M., Pereda, N., Jarne-Esparcia, A., Andrés, A. y Guàrdia-Olmos, J. (2010). Producción científica de la Psicología forense en España: un estudio bibliométrico. Revista Iberoamericana de Psicología y Salud, 1, 155-166.
- Bartol, C.R. y Bartol, A.M. (2005). History of forensic psychology. En I. B. Weiner y A. K. Hess (Eds.), The handbook of forensic psychology (2a. ed.) (pp.1-27). Hoboken: John Wiley and Sons.
- Davies, G., Hollin, C. y Bull, R. (2008). Forensic psychology. Chichester: Wiley. De Nicolás, L. (1995). Perfil, rol y formación del psicólogo jurídico. Papeles del Psicólogo, 63, 53-68.

- Fariña, F., Arce, R. y Novo, M. (2005a). Historia de la psicología jurídica en América y Europa. En R. Arce, F. Fariña, y M. Novo (Eds.), *Psicología jurídica* (pp. 27-42). Santiago de Compostela: Xunta de Galicia.
- Fariña, F., Arce, R. y Novo, M. (2005b). Notas sobre la psicología jurídica en España. En R. Arce, F. Fariña, y M. Novo (Eds.), *Psicología jurídica* (pp. 43-54). Santiago de Compostela: Xunta de Galicia.
- Jeanneret, G., Oña, A., Rego, P., Vaiman, M. y Pereno, G. (2015). Estudio bibliométrico de publicaciones científicas que utilizan pruebas de reconocimiento de emociones faciales. *Anales de Psicología*, 31. doi.org/10.6018/analesps.31.1.170831
- Quevedo-Blasco, R., Ariza, T. y Raya, L. (2012). Análisis de la producción de la Psicología Jurídica en España (1989-2010). *Aula Abierta*, 40, 127-138.
- Urra, J. (comp.) (2002). *Tratado de Psicología Forense*. Madrid, España: Ed. Siglo XXI
- Velasco, V., Amado, B. G. y Arias, E. (2014). Análisis bibliométrico de las publicaciones del congreso (Inter)Nacional de Psicología Jurídica y Forense. En R. Arce, F. Fariña, M. Novo y D. Seijo (Eds.), Psicología Jurídica y Forense: Investigación y Acción (pp. 3-13). Santiago de Compostela: Sociedad Española de Psicología Jurídica y Forense.

(Article received: 30-06-2016; revised: 08-11-2016; accepted: 21-11-2016)