

UNIVERSIDAD NACIONAL AUTÓNOMA DE MÉXICO PROGRAMA DE POSGRADO EN FILOSOFÍA DE LA CIENCIA



Actividad Académica: Alonzo Church: his logistic method and its applications								
Clave:	Semestre:	Campo de conocimiento:						
Carácter: Obligatoria () Optativa () de Elección ()				Horas por semana		Horas al semestre	No. Créditos:	
T !				Teóricas:	Prácticas:			
11po:				4		64	8	
Modalidad: Presencial			Duración del programa: 1 semestre					

Seriación: Si () No () Obligatoria () Indicativa ()

Introducción:

Alonzo Church (1903-1995) was a renowned mathematical logician, philosophical logician, philosopher, teacher and editor. He was one of the founders of the subject of mathematical logic as it developed after Cantor, Frege, and Russell. He was also one of the principle founders of the *Association for Symbolic Logic* and the *Journal of Symbolic Logic*. The list of his students, mathematical and philosophical, is striking as it contains the names of legendary logicians and philosophers – among them Martin Davis, David Kaplan, Stephen Kleene, John Barkley Rosser, Dana Scott and Alan Turing.

Church brought both the general outlook and the specific distinctions of formal logic to bear on philosophy in a distinctive way, by applying his "logistic method" —or method of formalization— to the philosophical topics that he discussed. Conversely, he also wove certain aspects of his philosophy into the fabric of formal logic as he presented it. The result was a formidable combination of philosophical vision and focused argumentation. For Church, the logistic method was not only necessary to obtain additional clarification, beyond informal discussion, and to make possible meta-mathematical investigations; it was also *the ideal method for dealing with philosophical problems in epistemology, metaphysics, and philosophy of language*. It was Church's view that philosophers such as Ayer, Ryle and Goodman, who did not aspire to this ideal, fell short.

Objetivo general:

Studying Church provides an opportunity to try to bring one's own methods into conformity with his logistic method while also understanding his views.

Objetivos específicos:

We will begin by studying Church's philosophy of logic with an eye to understanding how and why he developed his logistic method. Then we will turn to some of Church's own applications of this method to issues in metaphysics (the distinction between form and matter, ontology including physical objects, numbers and propositions), philosophical methodology (the paradox of analysis), the philosophy of language (formal semantics, the nature of propositions). Finally, I would like to dedicate part of the semester *to contemporary issues on which students can publish*. Students should already be familiar with the basic ideas of Frege, the basic apparatus of formal logic and should have some patience and willingness to engage with formal work. There is no need to be familiar with Church's own formal innovations – these will be explained from scratch.

Bibliografía y actividades:

Most readings will be from *The Collected Works of Alonzo Church* (2019, MIT Press). While this book is highly recommended, it is also expensive and so all readings will be made available to you. In the mean time, it is recommended that you look at C. Anthony Anderson's "Alonzo Church's Contributions to Philosophy and Intensional Logic," *Bulletin of Symbolic Logic*, vol. 4, pp. 129-171.

Nota: (en caso que exista alguna)

Medios didácticas:	Métodos de evaluación:
Exposición profesor(a) (x) Exposición alumnos () Ejercicios dentro de clase () Ejercicios fuera del aula () Lecturas obligatorias (x) Trabajo de investigación (x) Prácticas de campo () Otros:()	Exámenes o trabajos parciales(x)Examen o trabajo final escrito(x)Trabajos y tareas fuera del aula()Exposición de alumnos()Participación en clase(x)Asistencia(x)Prácticas()Otros:()

Evaluación y forma de trabajo

Imparte: Mail: o.marshall@filosoficas.unam.mx Día y hora del curso o seminario Mi y Ju, 16-18