

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

**Curso: CAPACIDADES COGNITIVAS EN HUMANOS Y NO  
HUMANOS: ARQUITECTURA COGNITIVA , EVOLUCION Y  
FUNCIONES**  
**2020-1**

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Programa

## **DESCRIPCION DEL CURSO**

En este curso estudiaremos diferentes capacidades cognitivas en organismos humanos y no humanos. La idea es fomentar una perspectiva comparativa entre estas capacidades a fin de trazar una filogenia de tales capacidades, entendiendo primero cuál es la mejor manera de describirlas, diferenciarlas, compararlas, etc. También nos interesa entender cómo la variación y la homoplasia se pueden distinguir en relación a las capacidades cognitivas de organismos biológicos, y si un enfoque más contemporáneo (nichos ecológicos, evodevo, herencia y fenotipos extendidos) pueden construir o ser afines de alguna manera con la idea central de la reconstrucción de filogenias.

## **REQUISITOS DEL CURSO**

Cada alumno escogerá uno de los temas que se exponen abajo, y:

- a. Empezará o continuará a escribir un ensayo sobre ese tema, basándose en algunos o todos los artículos recomendados en el tema en cuestión.
- b. Presentará sus avances sobre el tema, en un orden rotativo. En esta fase todos los demás alumnos discutirán, criticarán o harán sugerencias para mejorar el texto del alumno que presenta.
- c. Al final del curso cada alumno presentará su ensayo terminado.
- d. Los siguientes temas son sugerencias, pero los alumnos pueden sugerir otros temas que estén dentro de la idea general del curso, arquitectura, evolución y funciones de la cognición en animales humanos y/o no humanos.

## **TEMAS SUGERIDOS DEL CURSO**

- I. MEMORIA EPISODICA EN LAS CIENCIAS COGNITIVAS.

¿Qué es la memoria episódica (ME) en los humanos? Diferentes concepciones de la ME; ¿cuáles son compatibles con la idea de que algunos animales no humanos pueden tener ME al igual que los humanos? Memoria episódica, experiencia, percepción, conciencia, memoria autobiográfica, autoconciencia, etc.

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- Rotello, C. M., Macmillan, N. A., & Reeder, J. A. (2004). Sum-Difference Theory of Remembering and Knowing: A Two-Dimensional Signal-Detection Model. *Psychological Review*, 111(3), 588–616. <https://doi.org/10.1037/0033-295X.111.3.588>
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- Scarf, D., Smith, C., & Stuart, M. (2014). A spoon full of studies helps the comparison go down: a comparative analysis of Tulving' spoon test. *Frontiers in Psychology*, 5. <https://doi.org/10.3389/fpsyg.2014.00893>
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## II. CONOCIMIENTO EN ANIMALES HUMANOS Y NO HUMANOS.

¿Existe algún concepto interesante de conocimiento que sea aplicable, en el mismo sentido, a humanos y no humanos? ¿Es el concepto de conocimiento aplicable a algunos animales no humanos parte de, pero no suficiente, para hablar de conocimiento en algunos casos en los humanos?

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- Dupré, J., (2017), The metaphysics of evolution, *Interface Focus* 7: 20160148.
- Gould, J., (2015), Animal Navigation: Memories of Home, *Curr. Biol.* 25, R104-R106
- Jablonka, E., and M., Lamb, (2005), *Evolution in Four Dimensions: Genetic, Epigenetic, Behavioral, and Symbolic Variation in the History of Life*, The MIT Press, Massachusetts, USA
- Jesmer, B., Merkle, J., Goheen, J., Aikens, E., Beck, J., Courtemanch, A., Hurley, M., McWhirter, D., Miyasaki, H., Monteith, K., and M., Kauffman,

- (2018), Is ungulate migration culturally transmitted? Evidence of social learning from translocated animals, *Science* 361, 1023-1025
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- Sanz, C., Call, J., and C., Boesch, (eds), (2013), *Tool use in animals: Cognition and Ecology*, Cambridge University Press, Massachusetts, USA
- Tebbich, S., and I., Teschke, (2013), Why do woodpecker finches use tools?, en Sanz, C., Call, J., and C., Boesch, (eds), (2013), *Tool use in animals: Cognition and Ecology*, Cambridge University Press, 134-157
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- Bolhuis, J., and S., Verhulst, (eds), (2009), *Tinbergen's Legacy: Function and Mechanisms in Behavioral Biology*, Cambridge University Press, Massachusetts, USA

### III. FUNCIONES COGNITIVAS Y NEURONAS ESPEJO.

Diferentes sentidos del término ‘función’ en la ciencias biológicas y neurociencias. Funciones evolutivas y sistémicas. Funciones sistémicas y biológicas de las neuronas espejo en animales humanos y no humanos.

Buller, .....

García, C. L. “Funciones y homología funcional en las ciencias cognitivas” en Crítica.

### IV. EL PROBLEMA DE LA FILOGENIA DE LA CONCIENCIA.

Diferentes sentidos del término ‘conciencia’ en las ciencias cognitivas, la filosofía, y la etología cognitiva. Teorías de la conciencia. Conciencia y fenomenología, representaciones de primero, segundo o mayor grado, conciencia de estado y autoconciencia, filogenia de la conciencia en animales humanos y no humanos. La conciencia y la experiencia sensible.

Block N. (2007) *Consciousness, Function, and Representation*. Cambridge, MA: MIT Press.

Cabanac M., Cabanac A.J. and Parent A. (2009) The emergence of consciousness in phylogeny. *Behavioural Brain Research* 198: 267–272. California: Sage Publications.

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- Lycan W. (2004) “The Superiority of HOP to HOT.” En Gennaro R. (ed.), *Higher- Order Theories of Consciousness*. Massachusetts: Cambridge University Press.
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- Weiskrantz L. (1986). Blindsight. Oxford: Oxford University Press.
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#### V. VARIACION BIOLÓGICA, EVO-DEVO, HERENCIA EXTENDIDA, FENOTIPO EXTENDIDO Y SISTEMAS DE DESARROLLO EN LA BIOLOGÍA EVOLUTIVA.

- King, R.C., y Stanfield, W.D. 1985. A dictionary of genetics, 3rd edition. Oxford: Oxford University Press. En Laland, K. N., Odling-Smee, J., y Gilbert, S. F. 2008. Evo Devo and Niche Construction: Building Bridges. Journal od Experimental Zoology.310B:549-566
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VI. VARIACION BIOLÓGICA, PATOLOGÍAS COGNITIVAS, CLASES NATURALES Y SISTEMAS FUNCIONALES.

García, C. L. y Salcedo, M. (manuscrito), "Clases naturales, sistemas funcionales y trastornos mentales."