

Los desafíos al abordar experiencias de Design Thinking

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¿Qué es Design Thinking?

*“Design thinking es una **disciplina** que usa la sensibilidad y métodos de los diseñadores para hacer **coincidir las necesidades de las personas** con lo que es **tecnológicamente factible** y con lo que **una estrategia viable de negocios** puede convertir en valor para el cliente, así como en una gran oportunidad para el mercado” [Brown, 2008]*

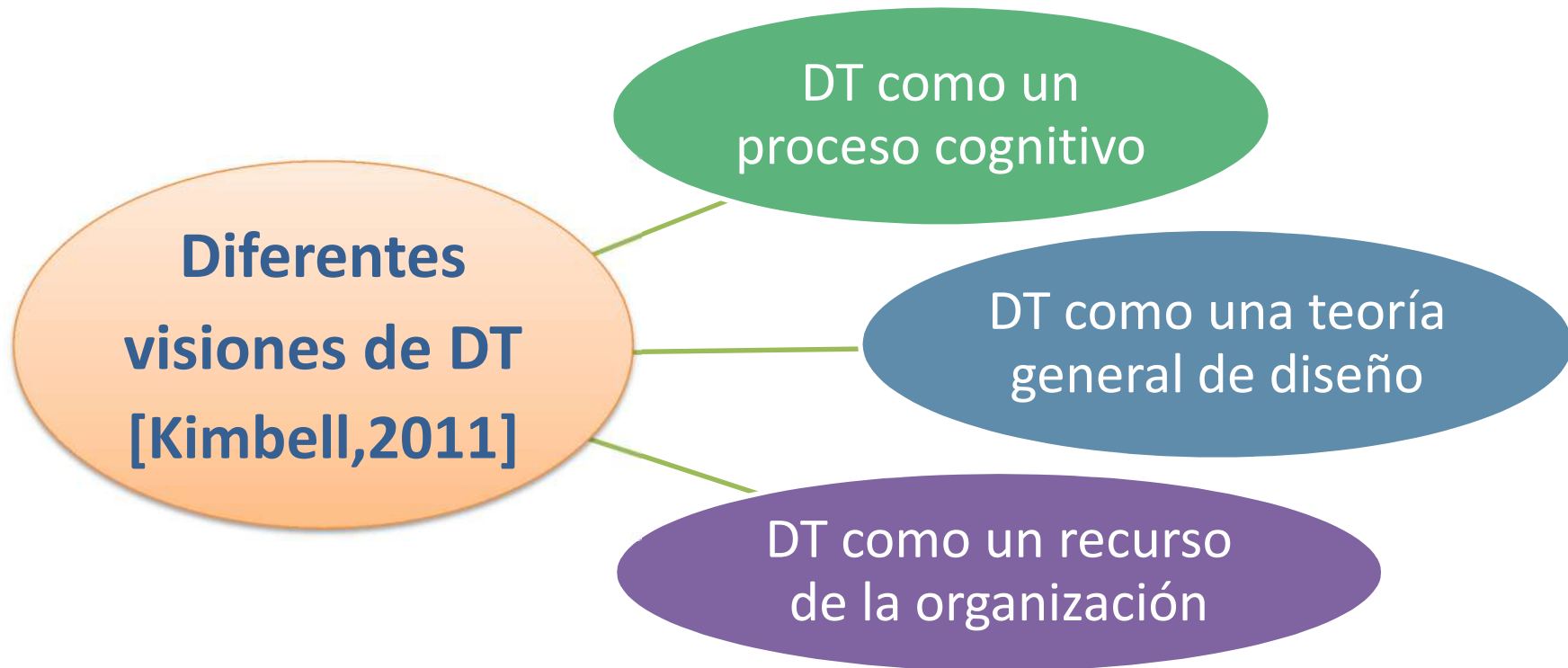
[Brown, 2008] T. Brown, “Design thinking. Harvard Business Rev,” Harvard Business Review. América Latina, vol. 86, pp. 84-95, September 2008.

¿Qué es Design Thinking?

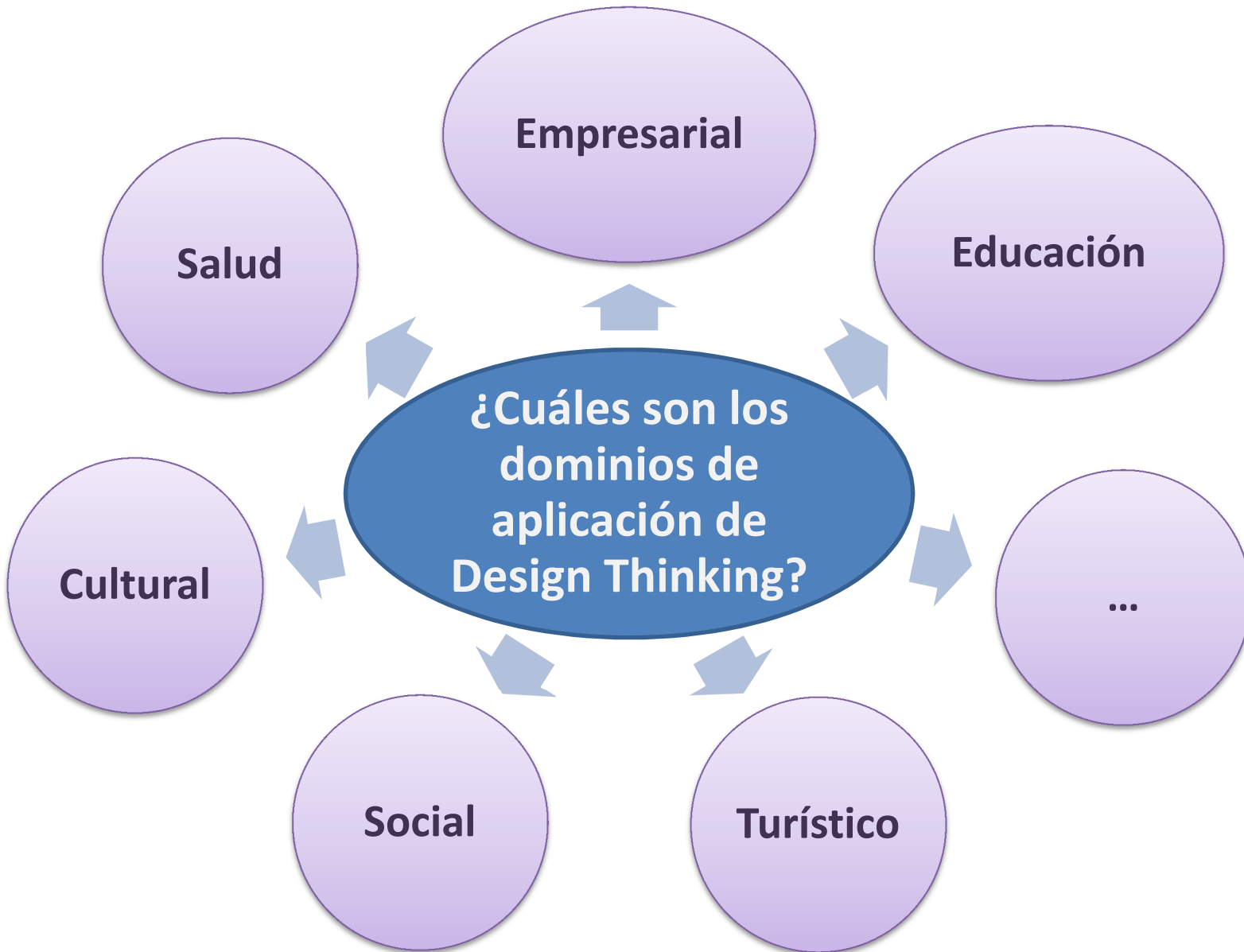
*“El término DT se refiere a los **procesos cognitivos** del trabajo de diseño, o las **habilidades de pensamiento** y las **prácticas que los diseñadores utilizan para crear nuevos artefactos o ideas y resolver problemas**”*
[Cross, 2011]

[Cross, 2011] N. Cross, “Design thinking: Understanding how designers think and work,” Berg, Oxford. New York, 2011.

¿Qué es Design Thinking (DT)?



[Kimbell, 2011] L. Kimbell, "Rethinking design thinking: Part I," Design and Culture, vol. 3, pp. 285-306, November 2011.



¿Qué se obtiene de cada experiencia de Design Thinking?

Producto
Software
Servicio

Proceso de
Aprendizaje/Enseñanza

Idea/Estrategia

...



[Corso and Challiol, 2020] C. L. Corso, C. Challiol, “Meta-framework para diseñar experiencias de Design Thinking”. IEEE ARGENCON 2020. In Press.

¿Qué personas pueden participar de una experiencia de Design Thinking (DT)?

Las habilidades que deben tener las personas que participan en DT [Brown, 2008] son:

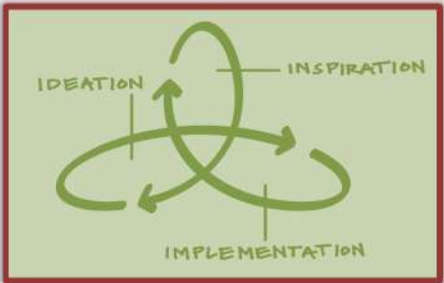
- **la empatía,**
- el pensamiento integrador,
- la experimentación,
- y la colaboración.



**Perfil de
Design
Thinker**

[Brown, 2008] T. Brown, “Design thinking. Harvard Business Rev,” Harvard Business Review. América Latina, vol. 86, pp. 84-95, September 2008.

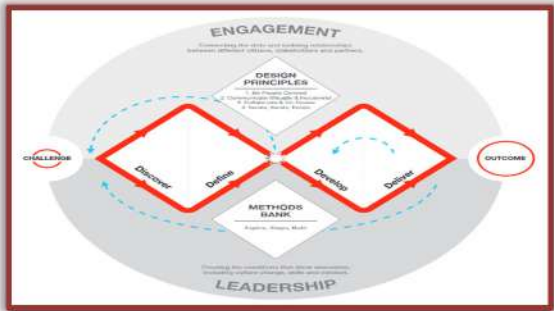
Emergen distintos frameworks conceptuales de Design Thinking (DT)



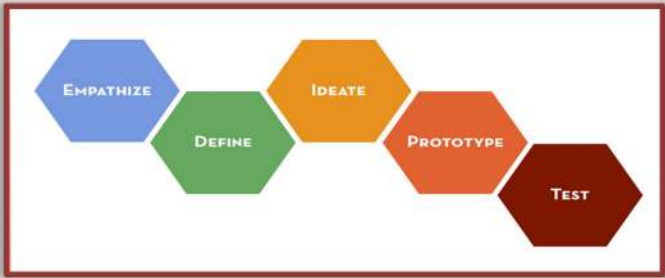
IDEO (3 Fases)



IBM (4 Fases)



Design Council (4 Fases)



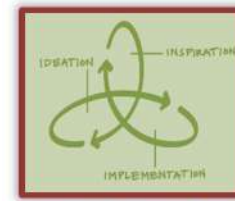
Stanford (5 Fases)



DT 101 (6 Fases)

Emergen distintos frameworks conceptuales de Design Thinking (DT)

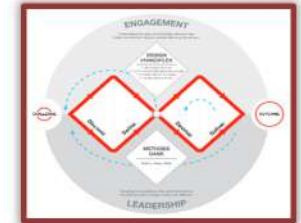
DT se debe enmarcar para que tenga sentido para el dominio [Carlgren et al., 2016].



IDEO (3 Fases)



IBM (4 Fases)



Design Council (4 Fases)



Stanford (5 Fases)



DT 101 (6 Fases)

[Carlgren et al., 2016] L. Carlgren, M. Elmquist, I. Rauth, “The challenges of using design thinking in industry—experiences from five large firms,” *Creativity and Innovation Management*, vol. 25, pp. 344-362, July 2016.

¿Qué recursos (técnicas) se usan en cada fase de los frameworks conceptuales?

Design Thinking Methods (172 items)			
(D=Define, N=Needfinding, S-Synthesis, I-Ideate, P=Prototype, T=Test; <u>underlined items are considered highly relevant</u> ; *no selection)			
2x2 Matrix	Customer Needs Matrix	<u>Low Fidelity Tech Prototype [P]</u>	SCAMPER
3D Rapid Prototyping	Dark Horse Prototype [P]	Mapping against the Hype Curve	Scenarios
5 Whys root cause analysis [N]	Day in the Life [N]	Mapping S-Curves	Selection
6 Thinking Hats	<u>Dark Research [I]</u>	Mindmaps [I]	Semantic Intuition
631 Method	Diary Studies	Miracle Question	Service Blueprinting
Active Listening [N]	Disney Method	Mockups [P]	Shadowing [N]
AEIOU-Framework	Elevator Pitch [T]	Moderated Blogs	Sketches & Scribbles [P]
Analogue Worlds	<u>Empathy Map [N, S]</u>	Moodboard [S]	Social Network Mapping
Analogous Empathy	<u>Expert Interviews [N]</u>	Mystery Shopping	Speed Dating
Ask your neighbor	<u>Extreme Users [N]</u>	NABC Pitch	Speed Geeking
Backcasting	Feedback capture and [T]	Nemography	Stakeholder Map [D]
Behavioral Mapping	Flow Analysis	Object Storming	Stimulus Word Analysis*
Behavioral Prototype	Focus Group [I]	Observation [N]	Storyboard [P]
<u>Brainstorming [D, N]</u>	<u>Framing & Reframing [D]</u>	Open Hardware Platforms	<u>Storyboarding [S]</u>
Bodystorming	Functional Analysis	Opportunity Area Formulation	Stretch the Goals
Bodystorming	Gamesplan	Osborn Checklist	Supershero
Braindump	Gap Analysis	<u>Pain Gain Map [S]</u>	Survey
<u>Brainstorming [I]</u>	Get inspired by the Future	<u>Phase Prototype [P]</u>	SWOT
<u>Brainstorming [I]</u>	Graphic Racordize	Participatory Design, Co-creation	The Cloud
Business Model Canvas [P]	Guided Tour	Participatory protomax*	Task Analysis
<u>Business Model Prototypes [P]</u>	Harvan & Hall	<u>Pattern Recognition [S]</u>	Test Camp
Camera Study	High Fidelity Tech Prototype [P]	Pecha Kucha	Time Lapse Video
Card Sorting	<u>"How might we..." Questions [I]</u>	Perfect Future Thinking	<u>Trend Research [I]</u>
CFB Method	<u>I Like Lunch [I, T]</u>	<u>Personas [D, S]</u>	Unboxing
Charrettes	Idea Bundling	Personal Inventory/ Bar Check*	Usability Testing [T]
Check-In/ Check-Out	Idea City/ Idea Shopping	Photo Chain Analysis	User Centred Scenario Modelling
Circles of Influence	Idea Mixer	Photo Ethnography	User Eyes Theme Box
Clustering [S]	Idea Nookin [I]	Pitching	User Integration Prototyping
Collage	Ideal Final Result/ TRIZ*	POEMS (Persons, Objects, Environment, Messages, Services)	User Map
Comics	Identifying Extremes and Mainstreams	<u>Point of View (Statement) [S]</u>	User Story Mapping
Community of Practice*	<u>Immersion [N]</u>	Porter's five forces	User Testing
Concept Extraction	Impose Constraints	Powers of Ten	Value Chain Analysis
Concept Scenario	In the shoes of your customer [N]	Prioritizing	Value Proposition Canvas
Consumer Forum*	Insight Acting	Problem Reversal Techniques	Video Prototyping
Consumer Clinics	<u>Insight Formulation [S]</u>	Prototyping for Empathy [P]	Visual Storytelling/ Visioning
Contextual Interviewing	Interview for Empathy	Pyramid of Purpose*	Visual Frameworks
Contextual Maps	Interviewing [N]	REIICC (Reduce, Eliminate, Increase, Create, Combine)	<u>Warm up/ Exercise Tools [I]</u>
Cooking Study	Kano Model*	Remember the Future	Wayfinding
<u>Critical Function Prototypes [P]</u>	<u>Lead User Method [N]</u>	Reverse Brainstorming [I]	Why How Ladderize
Critical Reading Checklist	Learnings from other brands	Role Playing [P, I]	<u>Wireframes [P]</u>
Cultural Probe	Lean Serious Play [P]	Sampling Techniques	<u>Wizard of Oz Prototype [P]</u>
Customer Experience (Chain)	Live Prototyping		Workable
<u>Customer Journey [N, S]</u>	Looking from the Future		World Cafe



172 posibles recursos que se pueden utilizar [Hehn et al., 2018]

[Hehn et al., 2018] J. Hehn, Uebernickel, F., M. Herterich, "Design Thinking Methods for Service Innovation-A Delphi Study," Pacific Asia Conference on Information Systems (PACIS). Japan, Art. 126, June 2018.

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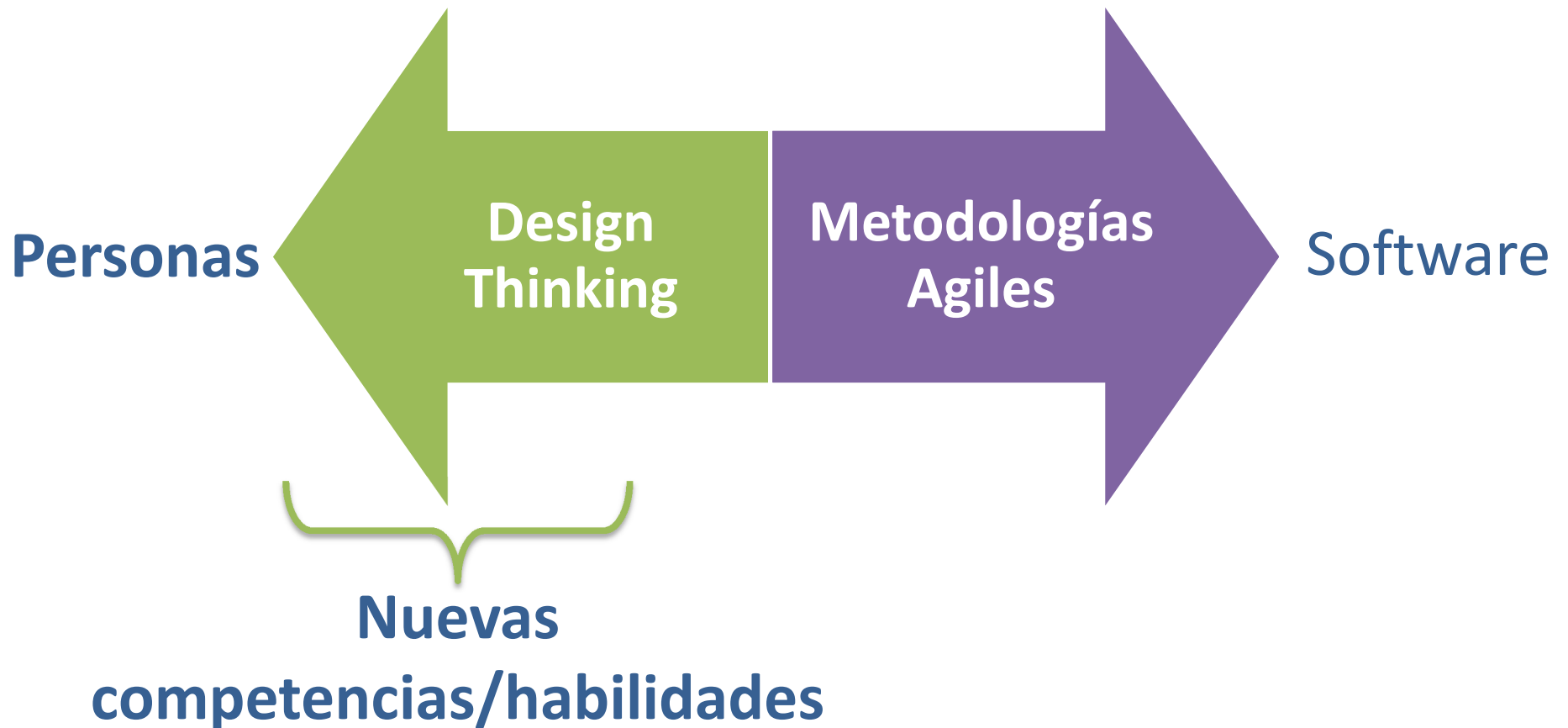
[Challiol et al., 2020] Challiol, C., Borrelli, F. M., Plexevi, F. G., Servat, C. M. R., Mendiburu, F.I., Gomez-Torres, E., & Gordillo, S. E. (2020). Co-diseño in-situ de Juegos Móviles usando un abordaje con recursos de Design Thinking. *Enfoque UTE*, 11(1), 1-14.



¿Cómo se diseña una experiencia de Design Thinking?

[Corso and Challiol, 2020] C. L. Corso, C. Challiol, “Meta-framework para diseñar experiencias de Design Thinking”. IEEE ARGENCON 2020. In Press.

Design Thinking combinado con Metodologías Agiles



¿Qué visión se va a tener de Design Thinking?
¿Micro-macro experiencias?

¿Qué se desea obtener de la experiencia?
¿Con quienes hay que empatizar?

Algunos Desafíos

¿Los participantes tienen un perfil de Design Thinker?
¿Se conocen?

¿Qué framework conceptual es más adecuado para el dominio? ¿Qué recursos son más adecuados?

Muchas gracias!!!



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