

# Rudolf Carnap and the Dilthey School: Humanities in the *Aufbau*

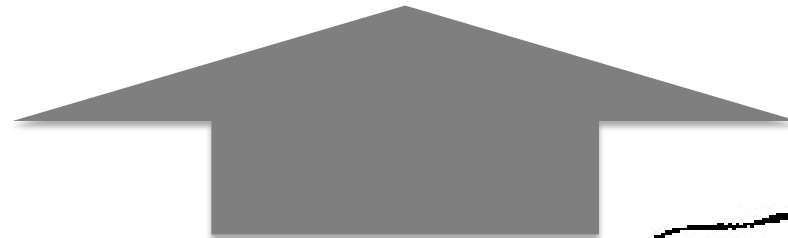
Christian Damböck

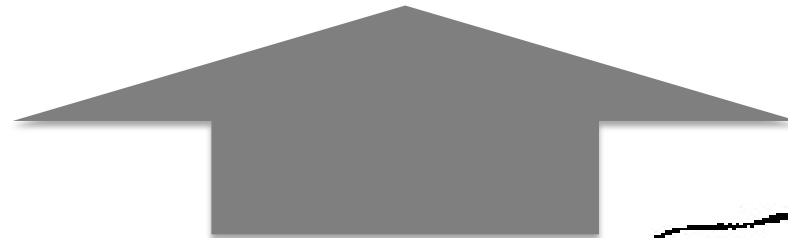
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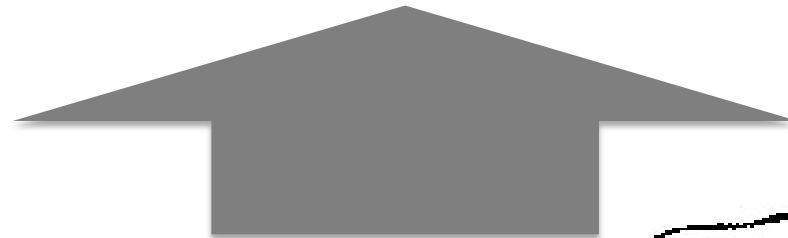
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**Frege, Russell  
Neo-Kantians  
Dilthey-School**



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# Outline

1. Carnap's *Aufbau*: Philosophy of Science? Epistemology? Or something else?
2. Purely structural definite descriptions (PSDD)
3. Beyond purity: Reducibility of object spheres
4. Outlook: Political, ethical, and aesthetical aspects

1. Carnap's *Aufbau*:  
Philosophy of Science? Epistemology?  
Or something else?

# Rudolf Carnap's *Aufbau*

- In his seminal book „Der logische Aufbau der Welt“ – „The Logical Structure of the World“ (here: *Aufbau*) Rudolf Carnap developed a „system of all concepts“
- The system was based on an autopsychological (and, optionally: a physicalistic) basis
- It tried to develop formal procedures that allow us to define each concept whatsoever by means of a formal representation of that basis
- However, what was the philosophical aim of that approach?



# Philosophy of Science?

- The *Aufbau* was by no means restricted to the realm of *scientific concepts*
- Rather, scientific concepts appear to show up in the system of definitions at a fairly high level (that Carnap actually never reached in his book)
- Moreover, demarcations between science and non-science, good and bad science, truth and falsity, etc. were not an issue at all in the *Aufbau*
- Thus, the *Aufbau* obviously was not a contribution to Philosophy of Science (at least not in the sense PoS developed after WW II)

# Epistemology?

- Carnap himself described the difference between the *Aufbau* and his own later philosophical approaches by means of the dichotomy epistemology [Erkenntnistheorie] (*Aufbau*) – philosophy of science (the later Carnap)
- But what does „epistemology“ mean here?
- If we take epistemology as the science that deals with notions such as „knowledge“ and „justification“ it is by no means evident that Carnap might have contributed to this discipline in the *Aufbau*
- The *Aufbau* obviously neither deals with „knowledge“ and „belief“ nor with „truth“, i.e., it is not doing epistemology (at least not in the modern sense)

# Or something else?

- The *Aufbau* is a piece of *scientific philosophy* because it is entirely based on a scientific standpoint
- However, it neither provides internal reflections on the sciences (at least not primarily) nor reflections on crucial scientific notions such as knowledge or truth
- Rather, the aim of the *Aufbau* is to deal with the role of the sciences in very general sense:
- Science, as part of our life, as a societal, political, ethical, and aesthetical value
- In other words, the *Aufbau* grasps the sciences not from the **internal** standpoint of modern PoS but from the **external** standpoint of the humanities (following leads from a number of contemporary philosophical currents in Germany – Dilthey-school, Neo-Kantianism ...)

# Modern Philosophy of Science



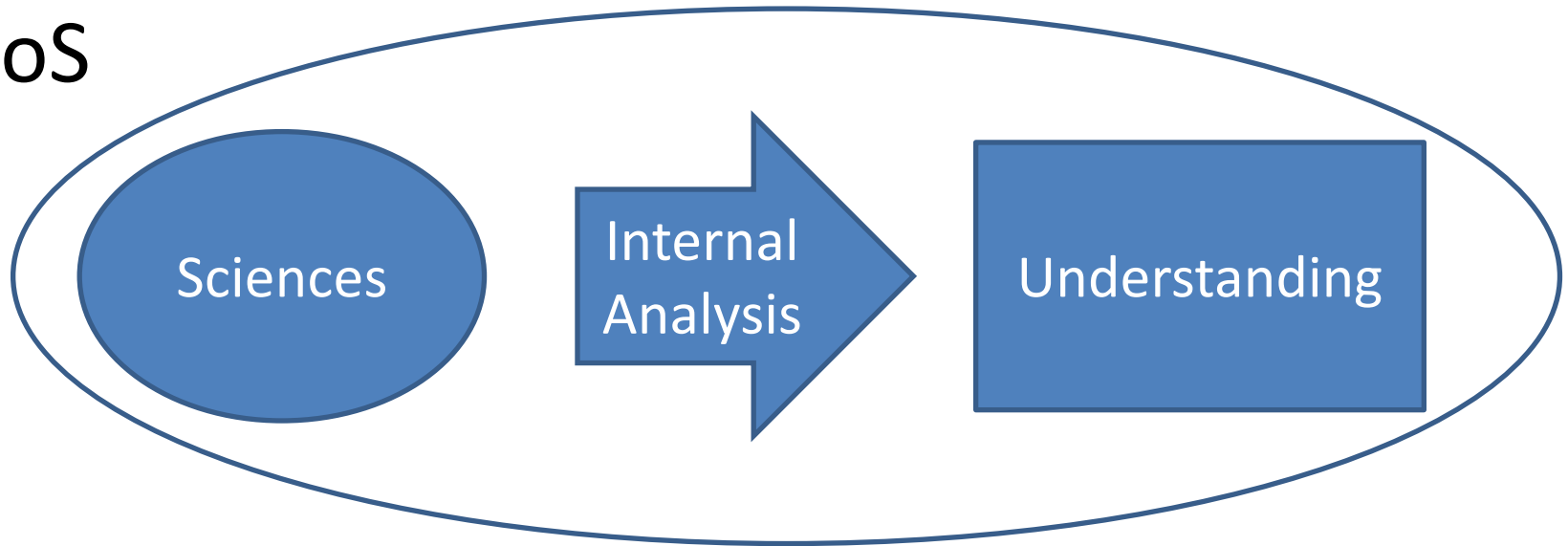
# Modern Philosophy of Science



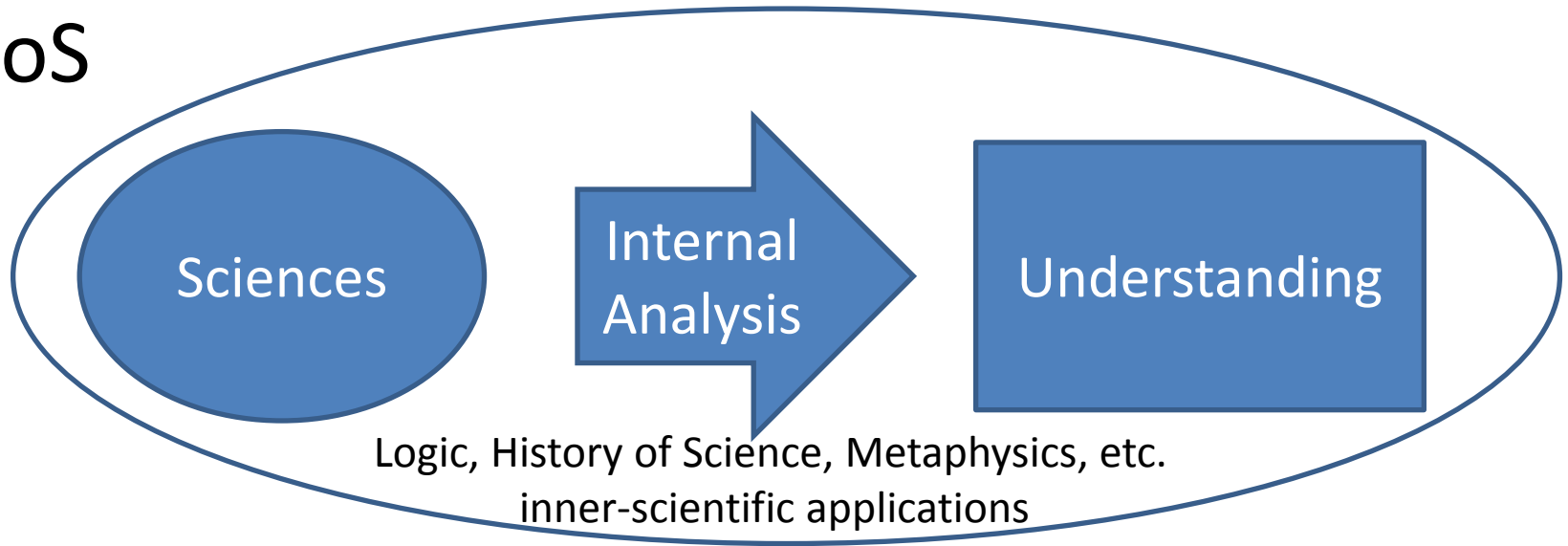
## The *Aufbau*



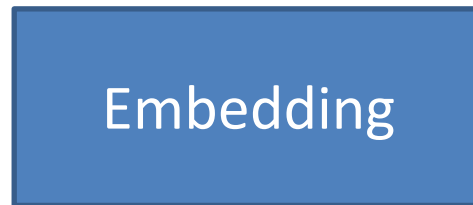
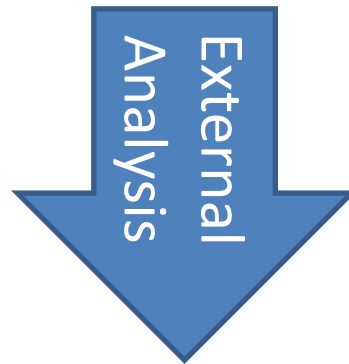
PoS



PoS

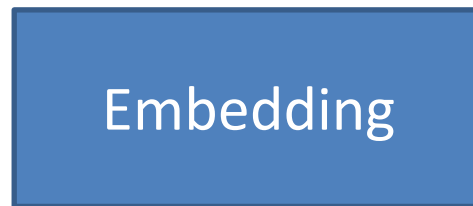
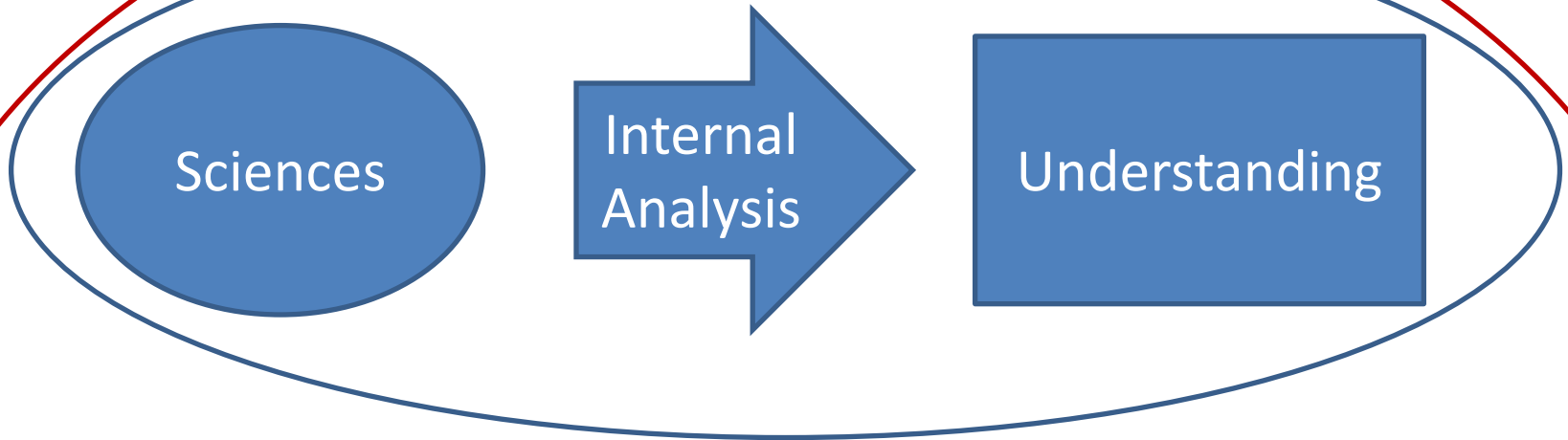


*Aufbau*



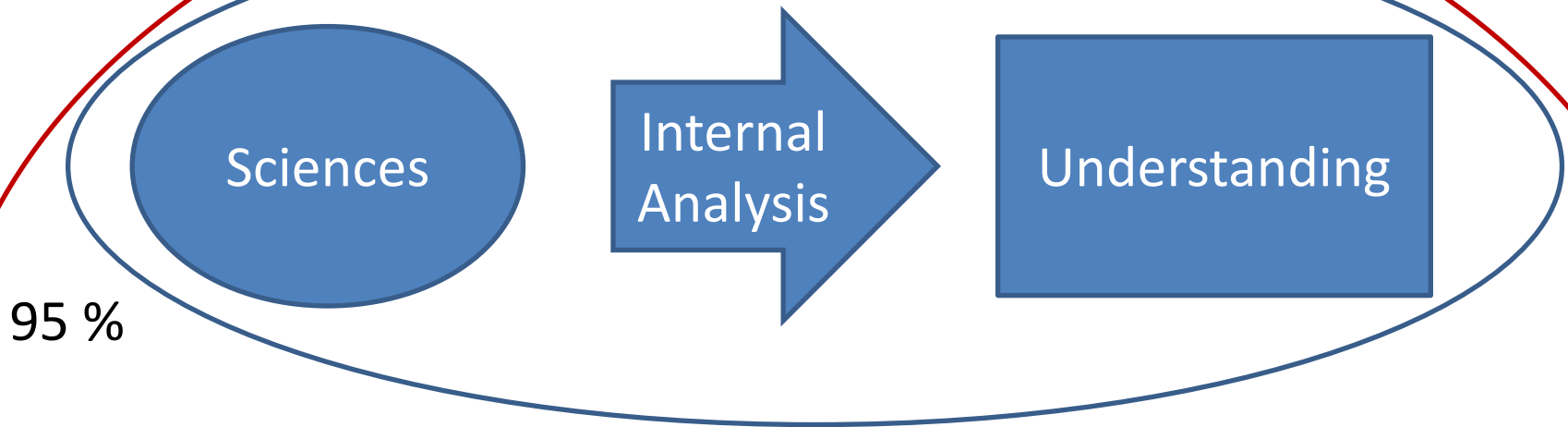
Logical  
Historical,  
Philosophical,  
Ethical,  
Political,  
Aesthetical  
Analysis of the Sciences

PoS'

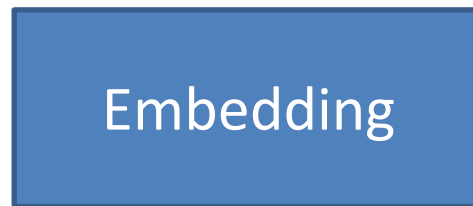
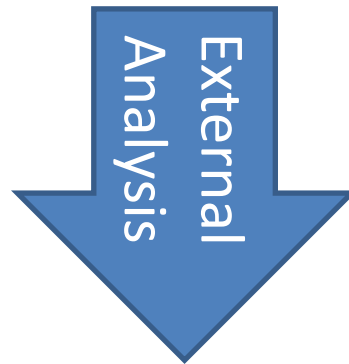




PoS'



5 %



## 2. Purely structural definite descriptions (PSDD)

# Quine (1951): the received view

Carnap is the main representative of the „second dogma of empiricism“ (radical reductionism):

- Carnaps account is based on a sense-datum language
- Each statement will be translated into the language of the sense-datum language
- (Everything that cannot be translated is meaningless)

# Friedman (1987): ~~the received view~~

„Carnap's *Aufbau* reconsidered“, *Noûs* 21:

- The basis of the *Aufbau* is not a sense datum language
- Full translation of every statement into the basis language is not required
- The aim is the development of purely structural definite descriptions for all concepts and therefore objectivity

# The basis of the *Aufbau*

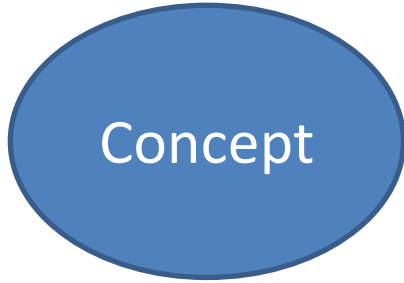
- There are several possible ways to construct a proper basis for the *Aufbau*
- One option would be a phenomenalist system, which consists of the elementary experiences of a certain person (i.e., includes sensual experiences as well as all kinds of abstract and emotional experiences)
- Another option would be a physicalistic basis, which consists of the world of sensorily perceptible spatiotemporal objects

# Reduction in the *Aufbau*

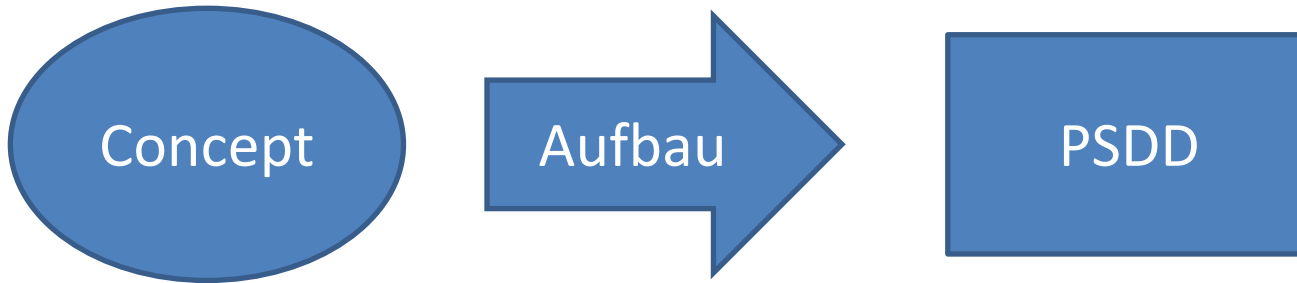
- Translations of statements or definitions of concepts, respectively, into the basis language need not necessarily be able to keep the full meaning („epistemic value“-„Erkenntniswert“) of a statement or concept
- Rather translations / definitions eventually might just keep the „logical value“ of a statement or concept (and may turn out „trivialities“, in terms of meaning)

# PSDDs as intersubjectively communicable structures

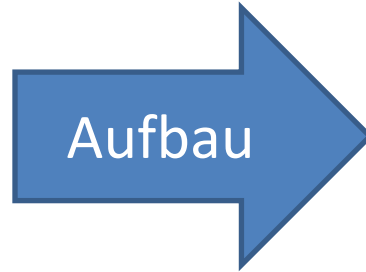
- A purely structural definite description (PSDD) must be **unique**, in the realm of all definitions of concepts as developed in the context of the *Aufbau* system, and it also must be **devoid of any reference to the world outside** of the realm of definitions
- PSDD, in particular, may not contain any ostensive (or intentional) elements
- Only definitions of that kind become **intersubjectively communicable**







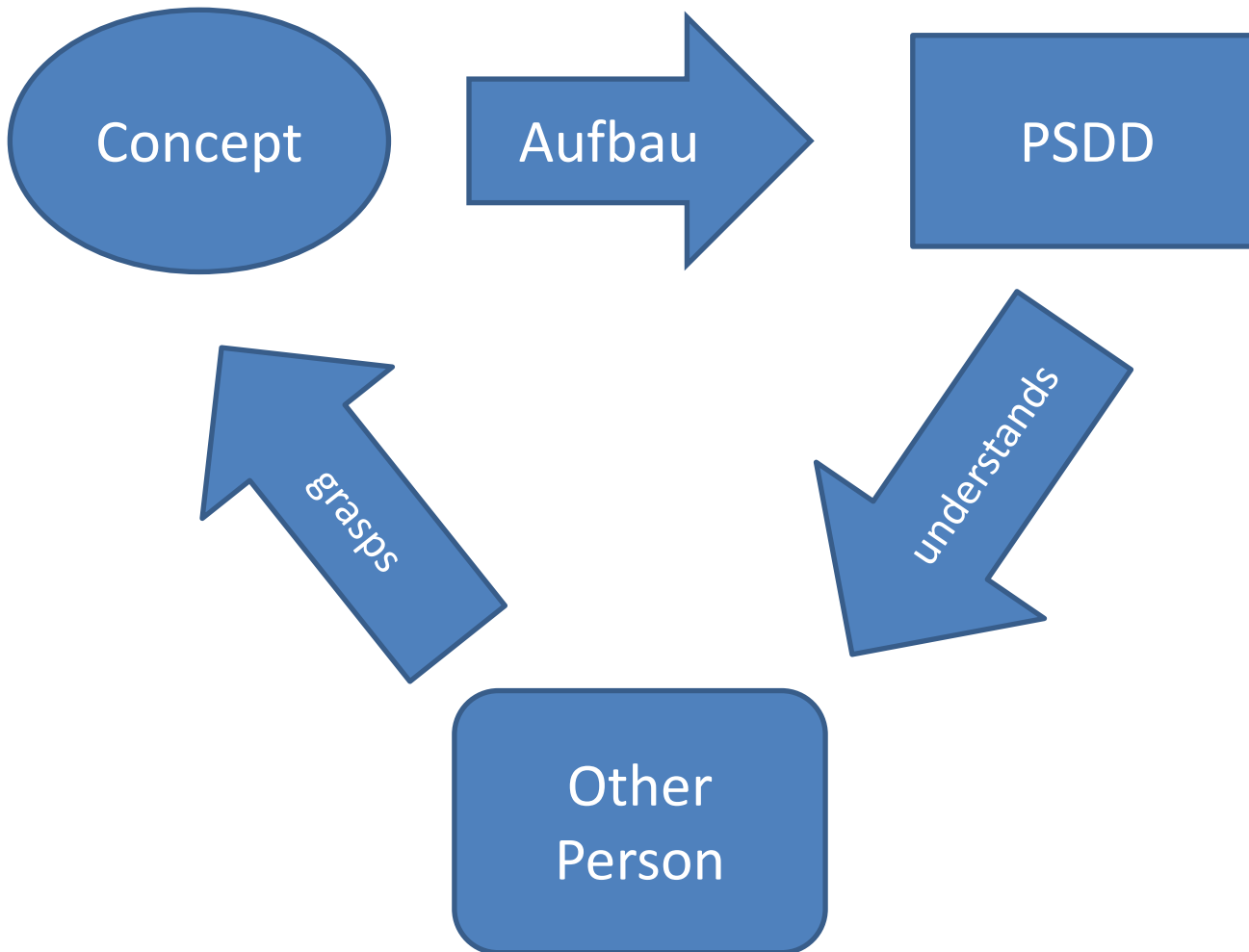
Concept



PSDD

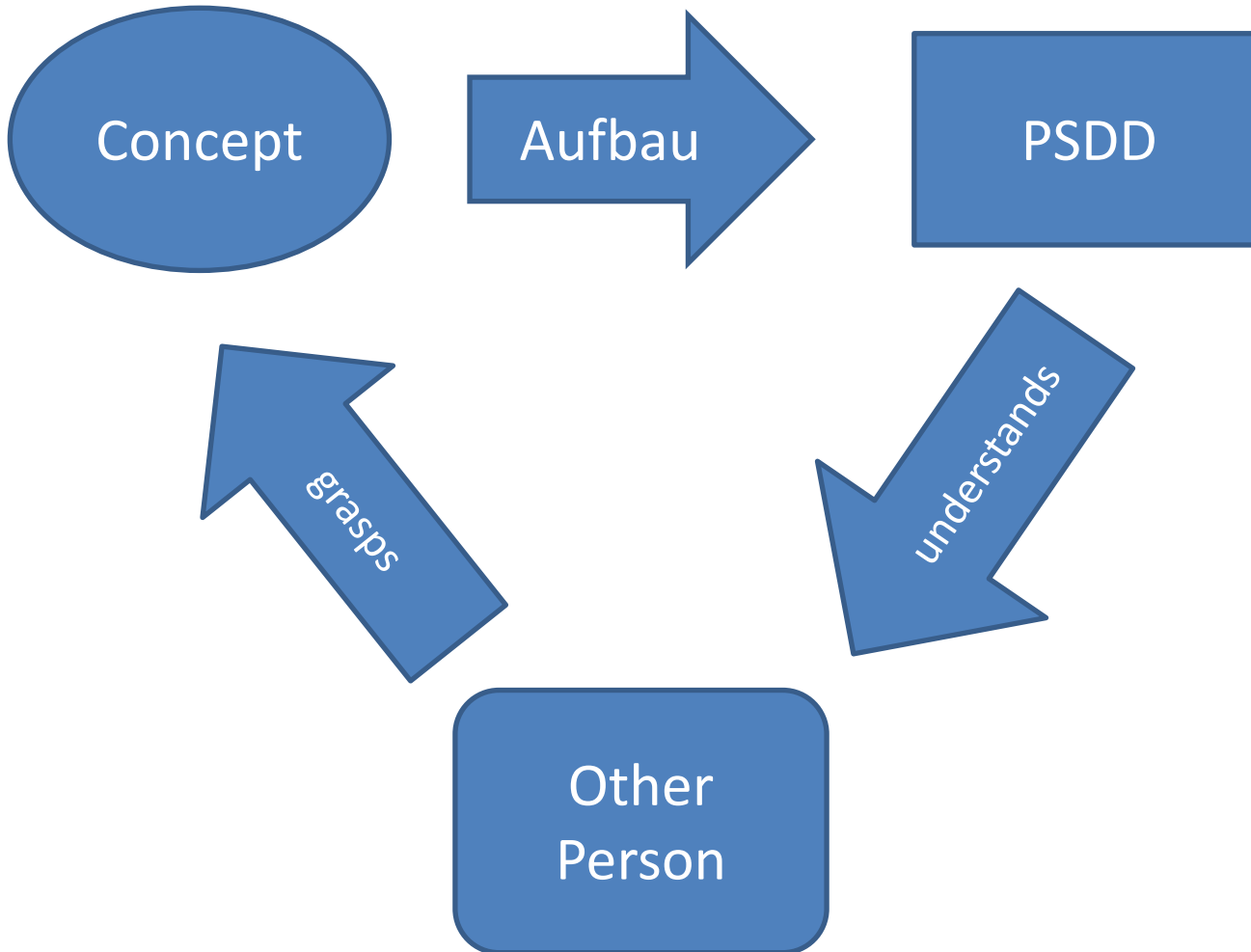
?

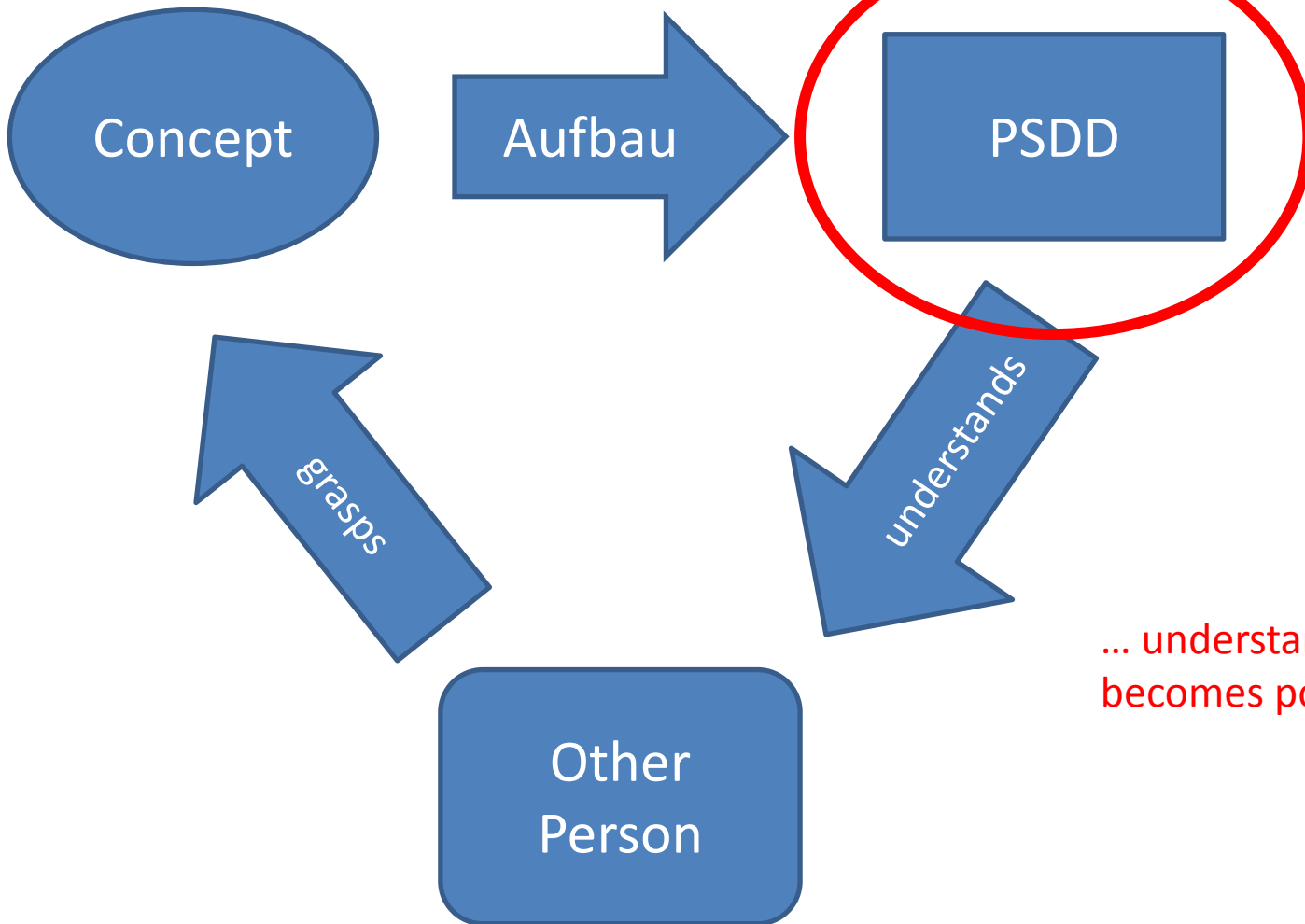
Other  
Person



# How pure can (or should) PSDD be?

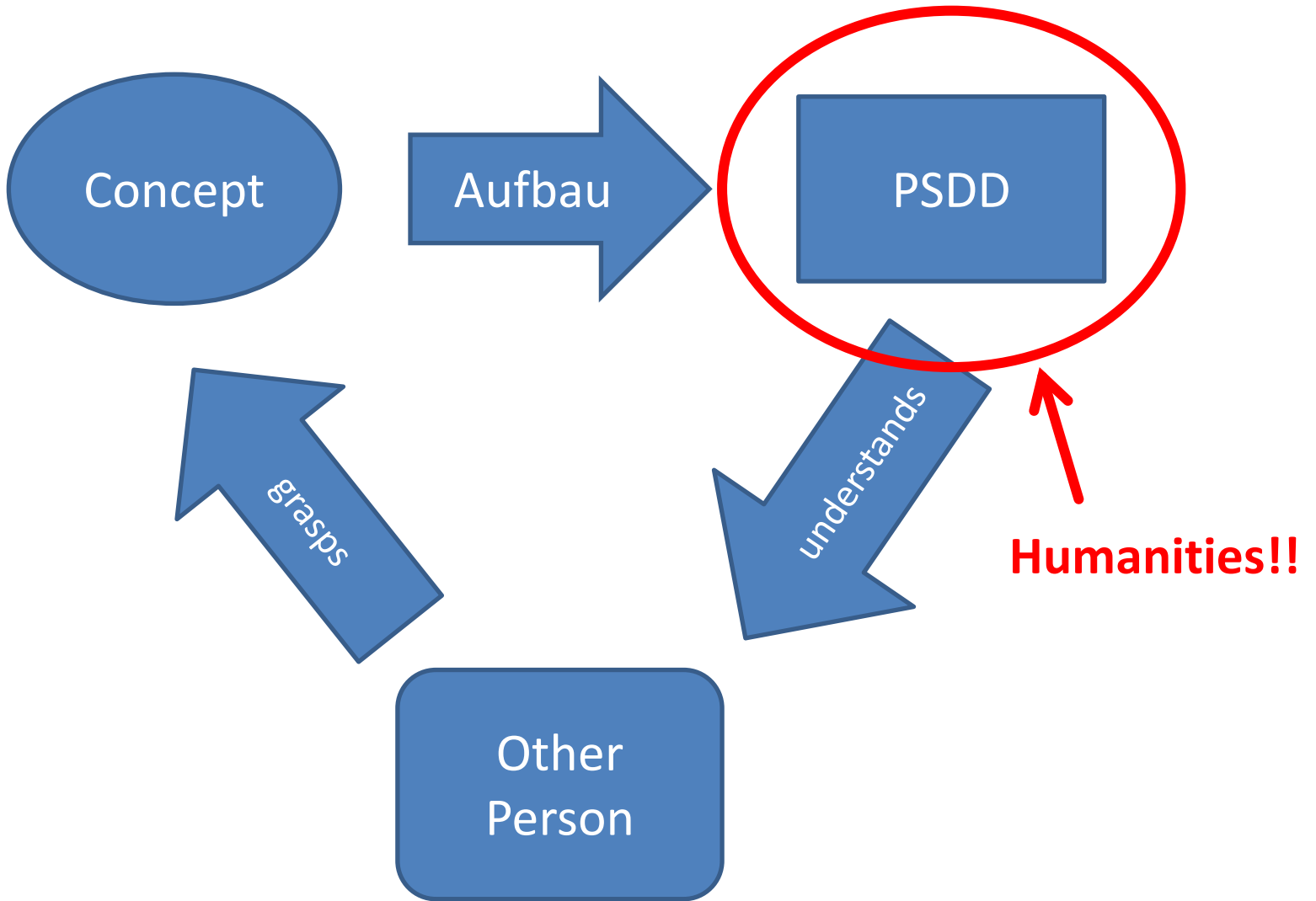
- I take it for granted here that PSDD should be devoid of ostensive or intentional aspects, i.e., should be entirely pure, in that respect
- However, the question is whether PSDD, for Carnap, would be sufficiently communicable **as soon as they are pure.**
- **Is purity the only condition for intersubjective communicability?**
- The answer is: no!
- There are a couple of further conditions Carnap (more or less tacitly) implements in the *Aufbau*. The aim of my talk is to uncover them.





Only if PSDD  
fulfill a number of  
further  
conditions ...

... understanding  
becomes possible



# 3. Beyond purity: reducibility of object spheres



# The objects spheres of the *Aufbau*

1. Autopsychological objects (elem. ex.)
2. Physical objects
3. Heteropsychological objects
4. Signs, intersubjective and scientific objects
5. Mental and cultural objects
6. Values

Values

Mental Objects

Intersubjective Objects

Heteropsychological Objects

Physical Objects

Autopsychological Objects

Values

Mental Objects

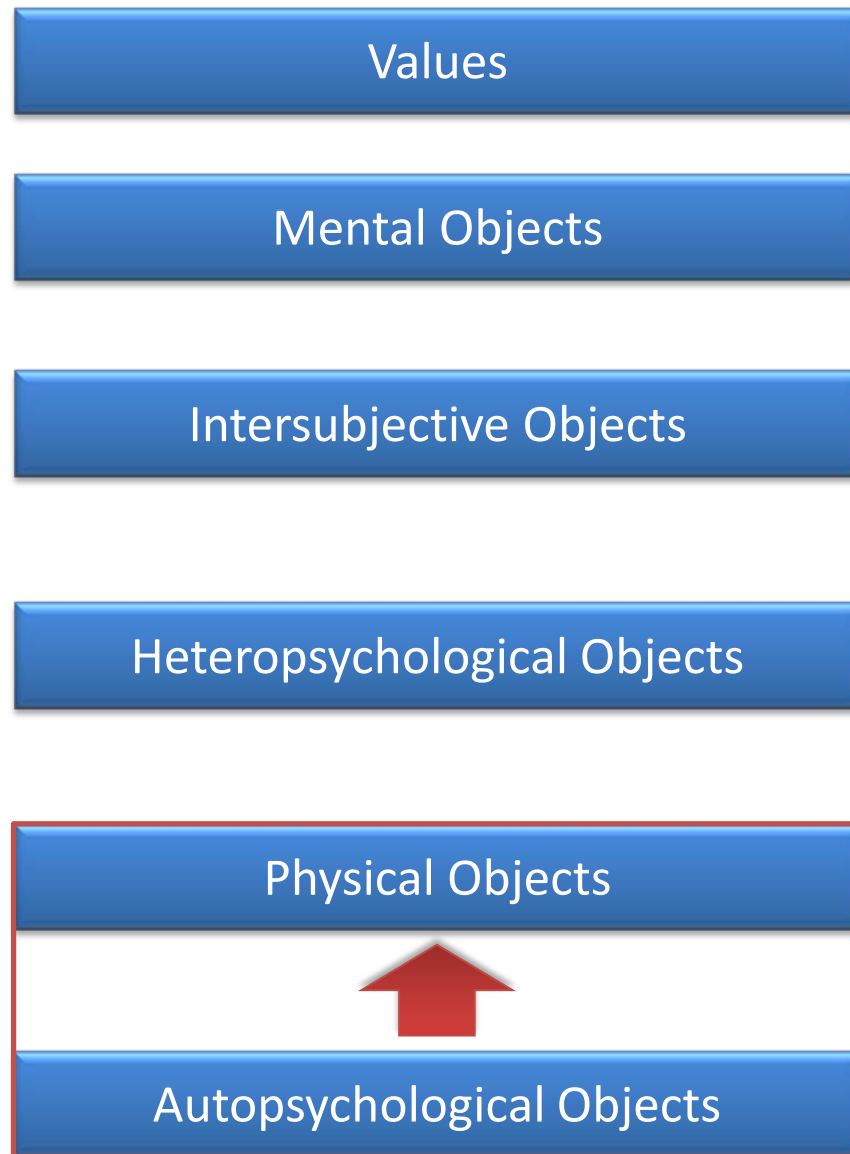
Intersubjective Objects

Heteropsychological Objects

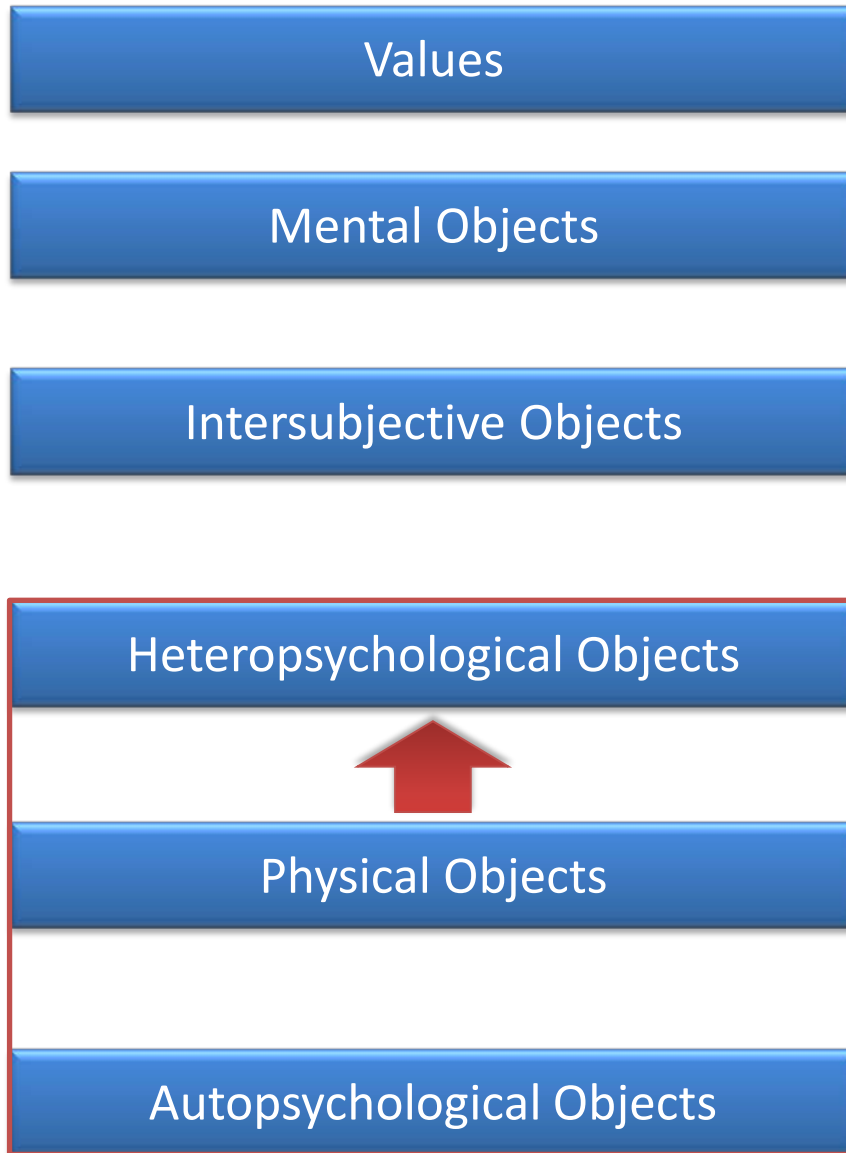
Physical Objects

Autopsychological Objects

# System C



# System C



# System C

Values

Mental Objects

Intersubjective Objects



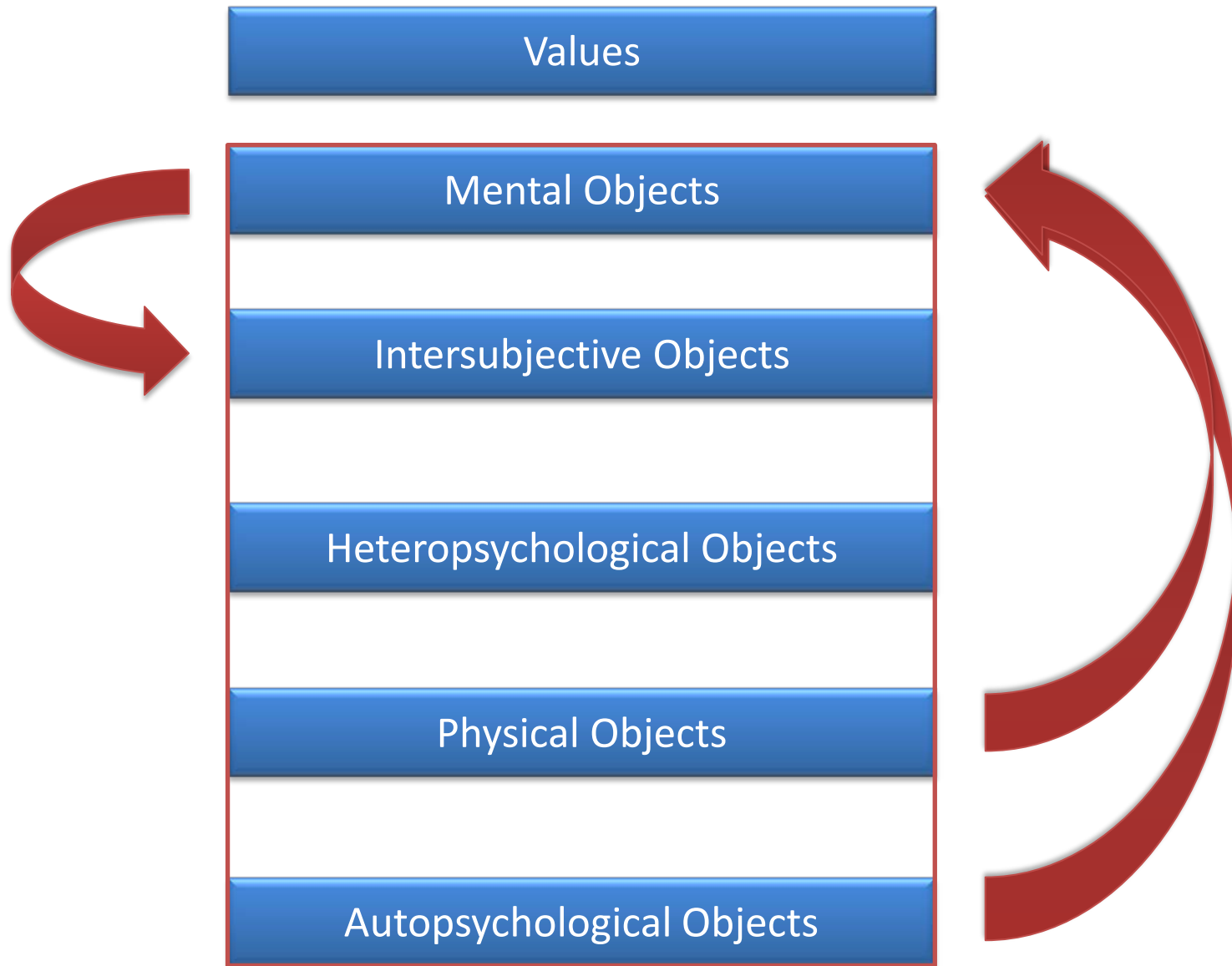
Heteropsychological Objects

Physical Objects

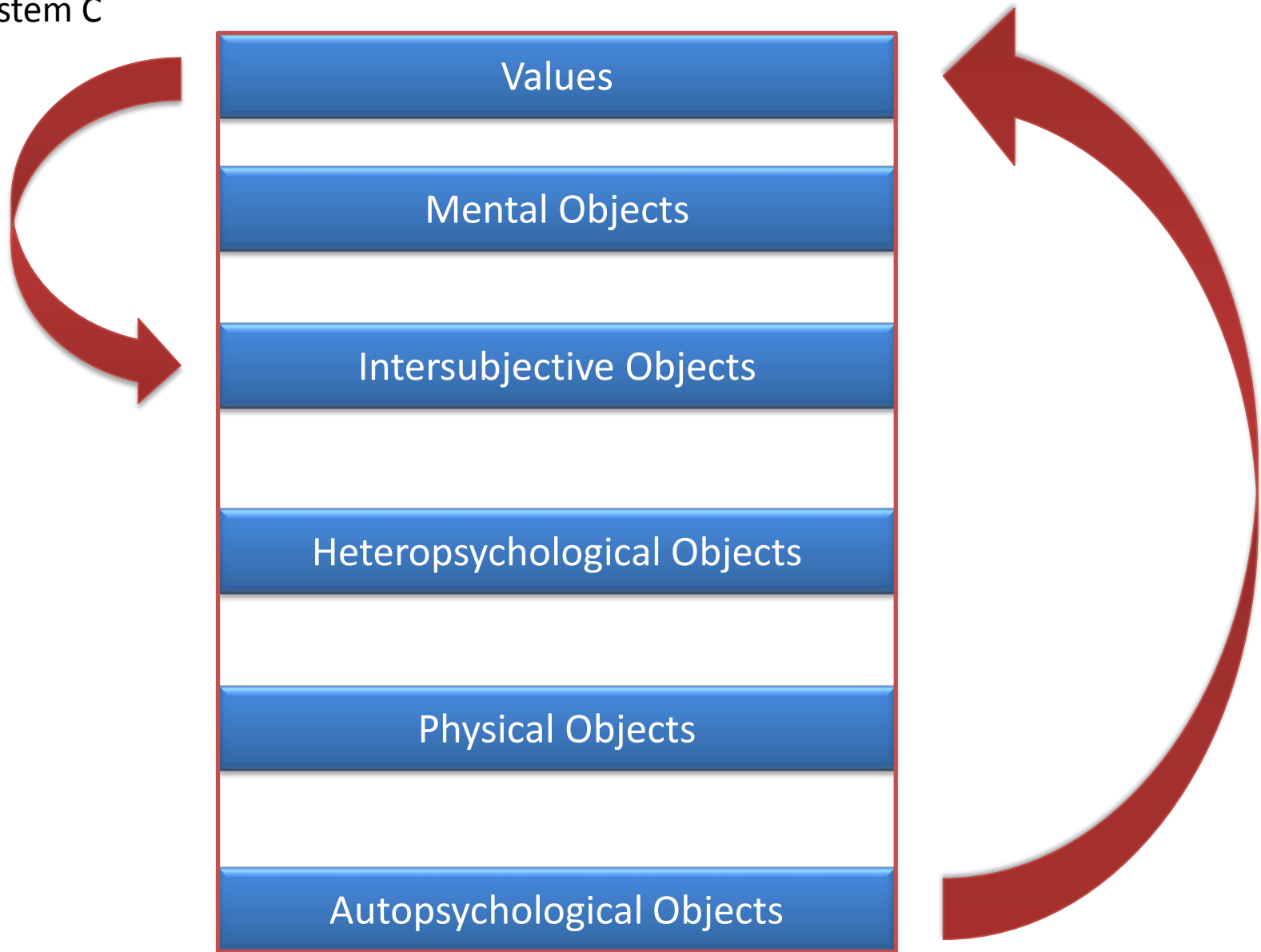
Autopsychological Objects



# System C



# System C





# But why do we need all these reductions between object spheres?

- The reduction procedures just illustrated are by far the most complex (and tedious) aspect of the *Aufbau* ...
- ... whereas reduction of the concepts of a certain sphere to its basis works comparably easy (e.g., reduction of the autopsychological concepts to elementary experiences)
- Thus, the question may (and should) come up, why (the hell) Carnap wants to enforce us to make all that effort?

# Thought experiment: *Aufbau* without reduction between o.s. (= System M)

- Let's find a suitable basis for each of the object spheres of the *Aufbau* and show how to reduce the concepts of the respective sphere to that basis
- We will obtain an easily construed system of all concepts
- Provided that the bases of the respective spheres are sufficiently unique we will obtain perfectly unique PSDD for all concepts
- These concepts thusly have to be perfectly intersubjectively communicable
- Or do they?

Values

Mental Objects

Intersubjective Objects

Heteropsychological Objects

Physical Objects

Autopsychological Objects

Values

Mental Objects

Intersubjective Objects

Heteropsychological Objects

Physical Objects

Autopsychological Objects



Elem. exp.

Values

Mental Objects

Intersubjective Objects

Heteropsychological Objects

Physical Objects

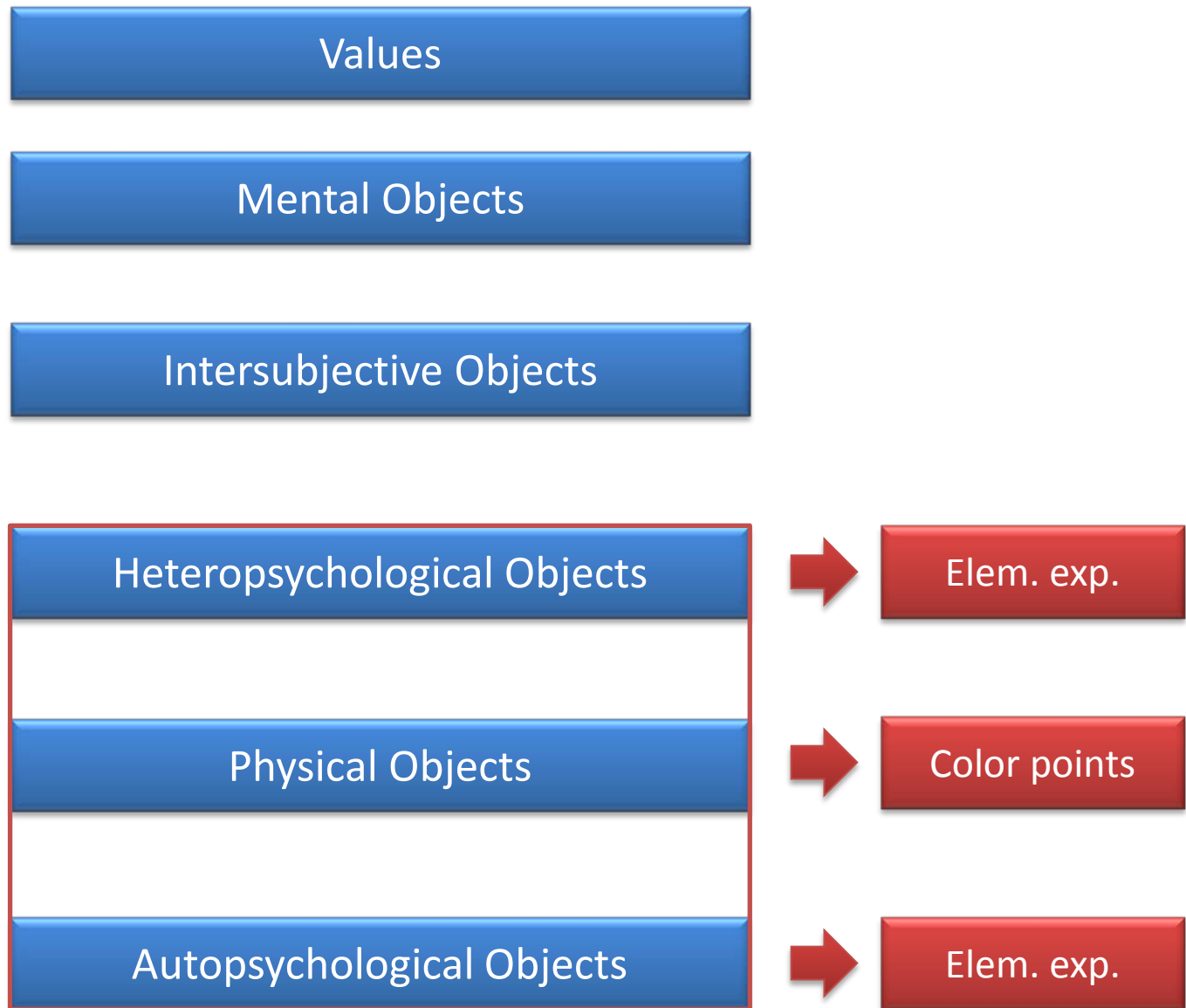
Autopsychological Objects

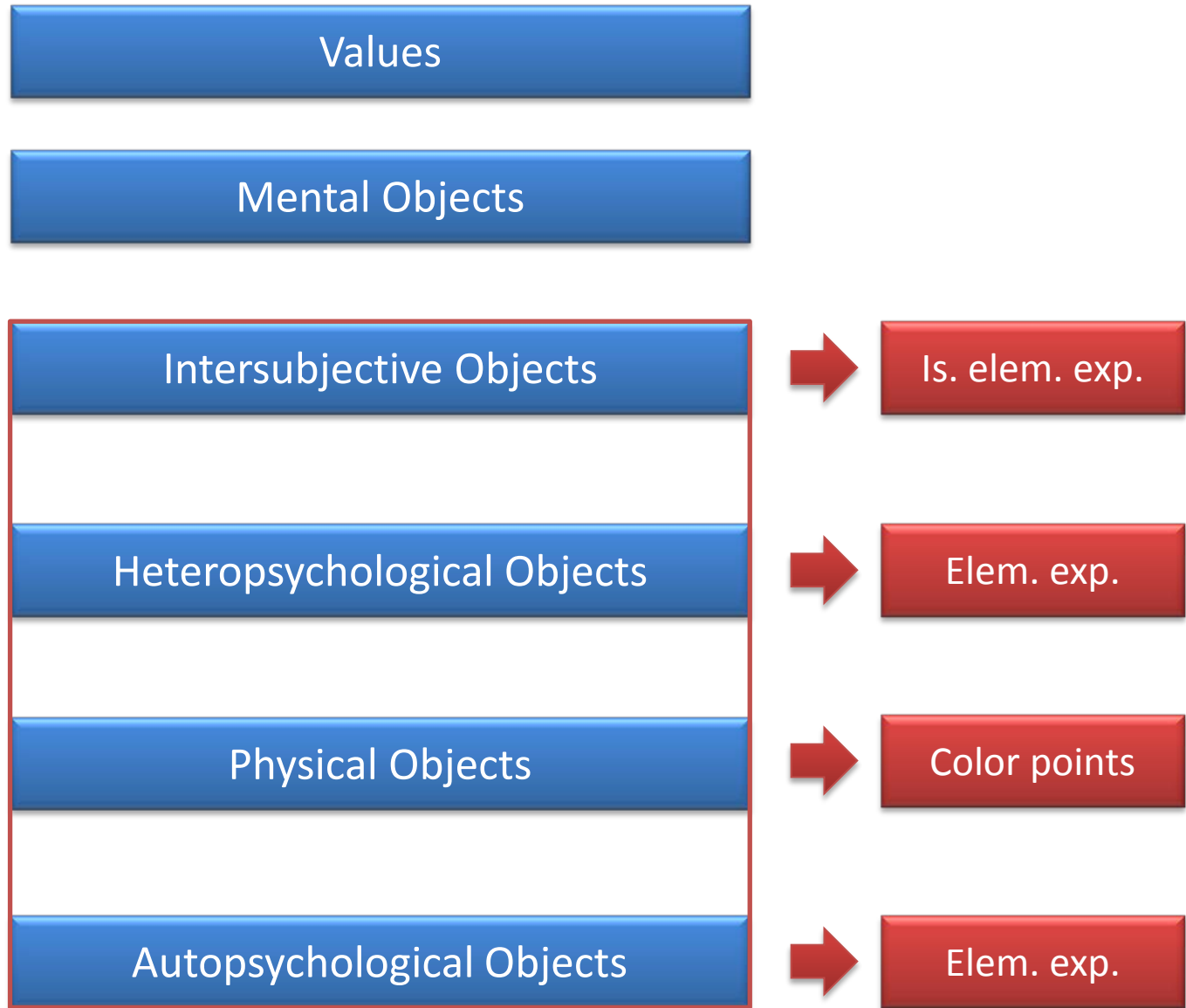


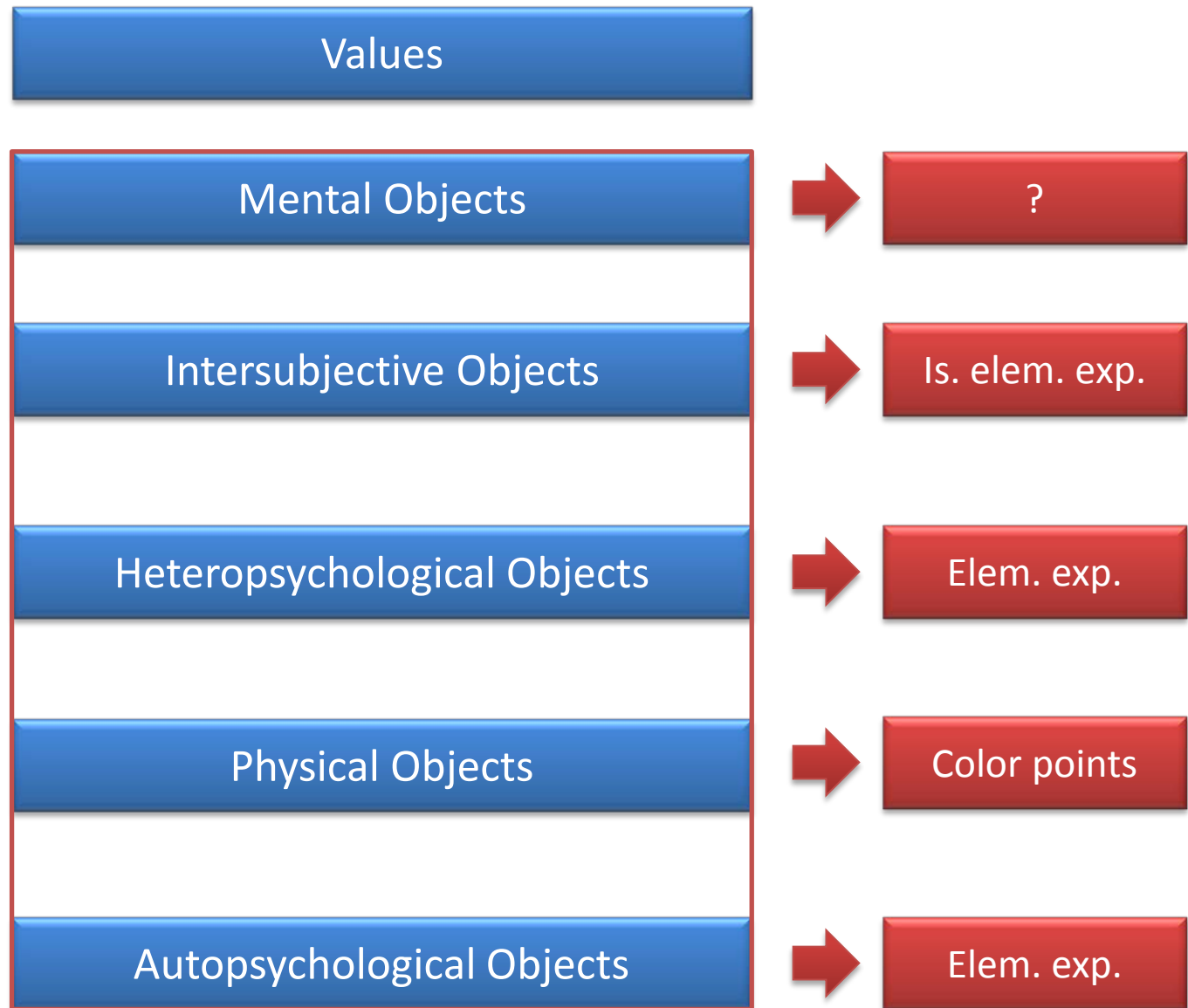
Color points



Elem. exp.

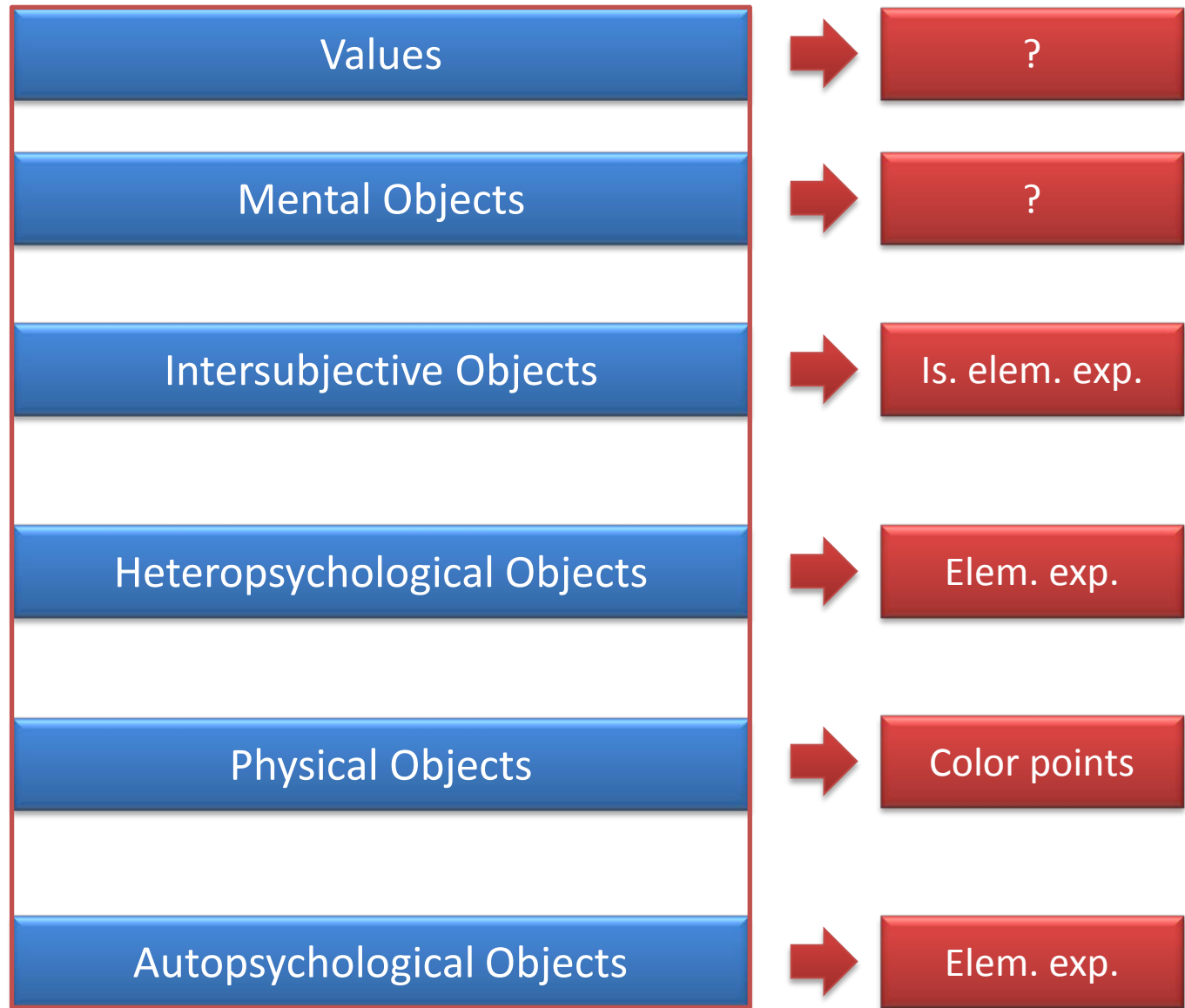








# System M



# But: is this really what Carnap wanted to have?

- The answer is obviously: no! ...
- ... because intersubjective communicability, for Carnap, obviously meant much more than just having **unique** PSDD
- The whole *Aufbau* is full of discussions (at several levels) that all concern conditions of intersubjective communicability that **go far beyond** (or have hardly anything to do) with the purity of PSDD
- All these more complex (and by now in the literature widely neglected) further conditions concern problems of **bridging gaps between object spheres**
- We mention **four examples** for such bridging conditions as can be found in the *Aufbau*

# 1. The autopsychological and the physical sphere

- I will not discuss here whether Carnap actually succeeded in his attempts to develop reduction procedures between these two object spheres (c.f. Quine)
- Instead, I want to point out that Carnap obviously took it to be a **fundamental condition** of the possibility of rational discourse of any kind to be able to bridge the gap between these two spheres
- Carnap unambiguously and emphatically defends **psychophysical parallelism** at several places of the *Aufbau* (§§ 19, 22, 57), while he clearly points out that „there is no place in science“ for **substance dualism** (§ 57)
- This is not just an accidental aspect: without psychophysical parallelism there would be no way for us **to understand** the physical world, i.e., the whole world of science and rationality would entirely break down

## 2. The heteropsychological and the physical

- Similarly, it is a fundamental condition for Carnap to be able to build bridges between the physical and the heteropsychological (either at the level of behaviour or physiology – cf. § 58)
- The very first draft to the *Aufbau* Carnap wrote in August 1920 (i.e., two earlier than „From Chaos to Reality“) is almost exclusively concerned with the very problem of making the heteropsychological accessible via the physical

### 3. The mental as being reducible to the psychological and the physical

- This is that part of Carnap's theory which is extremely close to the philosophical conceptions of Wilhelm Dilthey, via the Diltheyian account of the humanities as developed by Carnap's close friend Hans Freyer
- According to that view (i.e., Dilthey-Freyer-Carnap) mental objects have to be reducible both to their psychological and physical representations
- Another fundamental condition (against Platonism!!)

# 4. Values as being reducible to the autopsychological level

- Carnap developed his theory of values in a number of writings, mainly in the 1930s, but even before that time and later he obviously took much care to it (by far the longest reply in the Schilpp volume is concerned with values!)
- Values, according to Carnap, are not based on absolute value judgments or values as transcendent objects, they are rather a mere question of subjective emotion
- Another fundamental bridging condition arises, namely, that of being able to reduce values to the autopsychological sphere (rather than to the intersubjective sphere etc.) - §§ 59, 152

# Conclusion: against dualism, platonism, for parallelism, reducibility

- All kinds of concepts beyond the autopsychological sphere would fail to be intersubjectively communicable, in the context of System M ...
- ... because there would be no way here to transform a concept from level  $x$  ( $\neq$  autopsych.) to the level of autopsych. **where concepts are actually located**
- ... and there also would be no way to transform a concept from level  $x$  **to the intersubjective level** (etc.)
- Thus, it is not only *neccessary*, for Carnap, to have PSDD, in order to obtain intersubjective communicability, but we also necessarily must be able to provide **suitable bridging conditions** in the sense just described, in order to being able to reach that goal

# 4. Outlook: Political, ethical, and aesthetical aspects



N. Sciences  
Internal

Humanities  
External

Pure logic

Increasing degree of non-purity



PSDD



N. Sciences  
Internal

Humanities  
External

Pure logic

Increasing degree of non-purity



PSDD

Object spheres



# Political, ethical, and aesthetical aspects

- The goal of intersubjective communicability is not an end in itself
- Rather, intersubjective communicability via the *Aufbau* system is seen, by Carnap, as part of a fundamental reform of society and culture
- There are political aspects (social democracy) and ethical aspects (science as a guide in life)
- Moreover, the *Aufbau* must also be seen as an important part of the movement of *New Objectivity* („Neue Sachlichkeit“), dealing with nature's own expressivity („Eigenausdruck der Natur“) in such a way that science and art become converging enterprises
- (But these stories all have to be told elsewhere ...)

N. Sciences  
Internal

Humanities  
External

Pure logic

Increasing degree of non-purity



PSDD

Object spheres

Political aspects

Ethical aspects

Aesthetical aspects



N. Sciences  
Internal

Humanities  
External

