



**Winter 2022/2023**  
**Focus Subject Neurobiology: Molecular, Cellular, Systemic**  
**Neurobiology**

Module representative: Prof. Veronica Egger

Lecture period 17.10.2022 - 10.2.2022

<b>MCSN lecture I</b>			Date, comments
<b>Basic Neuroscience: Anatomy, development, plasticity</b>	<b>Monday</b> 8:30-10		<b>Room: DE2.121</b>
<b>Topic</b>	<b>Lecturer</b>	<b># VL</b>	<b>Green : confirmed</b>
<b>Introduction</b>			
History of neuroscience I: cellular neuroscience	<b>Egger</b>	<b>1</b>	17.10.
History of neuroscience II: Organization of behaviour	<b>Brembs</b>	<b>2</b>	24.10.
<b>Neuroanatomy</b>			
Neuroanatomy of the human brain	<b>Rötzer</b>	<b>3</b> <b>4</b>	7.11. 14.11.
<i>Consolidation/Example 1:</i> Neuroanatomy and physiology of motor system	<b>Lingnau</b>	<b>5</b> <b>6</b>	21.11. 28.11.
<i>Consolidation/Example 2:</i> Neuroanatomy and physiology of limbic system	<b>Neumann</b>	<b>7</b> <b>8</b>	5.12. 12.12.
<b>CNS/PNS Development</b> and neuronal stem cell biology	<b>Schneuwly</b>	<b>9</b> <b>10</b>	19.12. 9.1.
<b>Plasticity</b>			
I Vertebrate plasticity	<b>Egger</b>	<b>11</b>	16.1.
II Invertebrate learning and plasticity	<b>Brembs</b>	<b>12</b> <b>13</b>	23.1. 30.1.
III Epigenetics	<b>Menon</b>	<b>14</b>	6.2.

<b>MCSN lecture II</b>			<b>Comments</b>
<b>Neuronal cell biology, signalling, sensory physiology</b>	<b>Thursday 8<sup>30</sup>-10</b>		<b>Room: DE2.121</b>
<b>Topic</b>	<b>Lecturer</b>	<b># VL</b>	<b>Date(s)</b>
<b><i>Molecular toolbox</i></b>			
Signalling/receptors	<b>Schneuwly</b>	<b>1</b>	20.10.
Molecular		<b>2</b>	27.10.
Transport, cytoskeleton	<b>Kerkhoff</b>	<b>3</b>	3.11.
Ion channels, GPCRs	<b>Wetzel</b>	<b>4</b>	10.11.
Synaptic transmission/ electrical signalling		<b>5</b>	17.11.
<b><i>Examples: Molecular pathways, processing</i></b>			
Neuropharmacology	<b>Flor</b>	<b>6</b>	24.11.
Dendritic integration	<b>Egger</b>	<b>7</b>	1.12.
<b><i>Sensory transduction and processing</i></b>			
Chemical senses: Vertebrates	<b>Egger</b>	<b>8</b>	8.12.
Invertebrates	<b>Brembs</b>	<b>9</b>	15.12.
Audition	<b>Marcum</b>	<b>10</b>	12.1.
Vision vertebrates	<b>Brembs</b>	<b>11</b>	19.1.
Vision invertebrates		<b>12</b>	26.1.
<b><i>Neuron-Glia interactions</i></b>	<b>Di Benedetto</b>	<b>13</b>	2.2.
		<b>14</b>	9.2.

**+ MCSN Methods seminar** –Tues 5- 6:30 pm **Room: SR DE 1.129**  
To be announced on Oct 17th