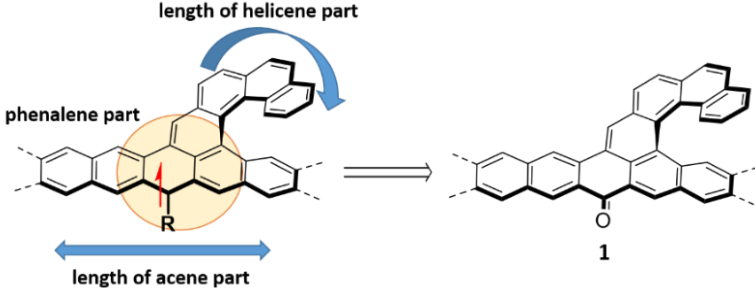


CHEMISTRY MASTER - M2 INTERNSHIP 2023-2024 (end of January – end of June)	
TITLE	Organic synthesis and physico-chemical study of aceno[n]helicenones
COMPETENCES / INTERESTS	Organic synthesis of new paramagnetic polycyclic aromatic hydrocarbons Chemistry of helical aromatic compounds Photophysical and electrochemical studies
SUBJECT	<p>The subject is to explore nucleophilic addition of organometallic reagents such as aryl-lithium or aryl-magnesium salts to a carbonyl group of acenohelicenes 1, which were recently prepared in our group. This will lead to new, hitherto unexplored helically chiral aceno-helicene structures with a paramagnetic centre. These materials are of immense interest to many scientific fields, because the resulting materials can exhibit properties such as natural dichroism, non-linear optical behavior, ferro-, pyro- or piezoelectricity.</p> 
TECHNIQUES USED	Organic and organometallic reactions Chemistry in glovebox Purification techniques: chromatography, crystallization, sublimation. Characterizations of organic compounds: NMR, EPR, IR, crystallography, UV-vis.
HOST LABORATORY	Centre de Recherche Paul Pascal
TEAM	M3 : Molecular Materials & Magnetism
SCIENTIFIC DIRECTOR	<p>Name : Andrej Jancarik</p> <p>Tel : 05 56 84 56 24 Mail : andrej.jancarik@crpp.cnrs.fr</p> <p>Address : CRPP-CNRS, 115 avenue Schweitzer, 33600 Pessac</p>
<p>Possibility to pursue the internship until the end of August: NO</p> <p>Possibility to offer the internship to a M1 if not attributed to a M2: NO</p>	