

## NEWSLETTER

#11 | October 2023

After a quiet summer, the activities of the teams have resumed at their highest level. In this issue, you will find the profile of two young MD-PhD recently recruited to do their research activities at the CIIL, and they have recently been awarded the H Bonus of the University Hospital of Lille. We also present François Massol, a researcher with an atypical profile who reinforces the large diversity of researchers of the unit. Before the end of the year, we will also welcome Sandra Weller, an Inserm researcher, who will join the team of Alexandre Grassart in the frame of a mobility. You will discover her profile in this newsletter. We also continue to present the engineers of the unit with the portrait of Saliha Sendid who works in the team Pulmonary Immunity. Although we host new researchers, others end their career. This is the case of Anne Tsicopoulos, Dominique Raze and Corine Glineur. We wish them to enjoy their new life. During the last few months, the members of the CIIL hosted in the IBL have appreciated the new dynamic in the building with the arrival of Alexis Denhez, our new head of the technical and logistical service. We thank him a lot for his professionalism. With the departure of Isabelle Aslani, the absence of secretary general leads to additional administrative burden for the direction. We are therefore glad that she will be replaced by Sabine Blin who will start in November. You can find a summary of Sabine's career in the newsletter. The admin service is also under pressure due to the absence of Karine Serrure and Natacha Olivier who are on sick leave. We wish them to recover rapidly and to come back in good health. October is also the month of the arrival of new PhD students and, this year, they are 14 to join the CIIL. We wish them a warm welcome.



Jean Dubuisson

## Portraits of CIIL researchers



**Stéphanie LEJEUNE**  
MCU-PH  
University of Lille/CHU Lille

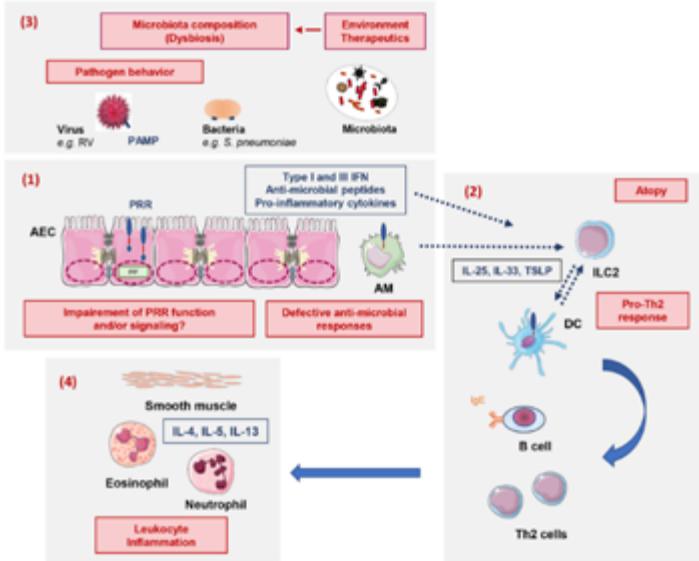
I am an assistant professor of Pediatrics at the University of Lille, and hospital practitioner in the department of Pediatric Pulmonology and Allergy in Jeanne de Flandre hospital, Lille University Hospital.

In 2014, I had the opportunity to follow a Master 2's degree, allowing me to discover fundamental research for the first time, under the direction of Pr Antoine Deschildre, Dr Philippe Gosset and Dr Muriel Pichavant in the Center for Infection and Immunity of Lille. Since then, I have been able to split my time between the clinics and the laboratory.

During my PhD thesis, I was able to pursue and develop the translational and collaborative research initiated in Pasteur institute on pediatric asthma and viruses, based on both an experimental in vitro epithelial cells model, and on the samples from the VIRASTHMA pediatric cohorts. These clinical studies, partly funded by the Hauts-de-France region, have started in 2008 in collaboration with the pediatric hospitals in the region, the

virology and bacteriology units, the immunology laboratory and the biostatistics department of Lille University Hospital.

Asthma is a childhood-onset heterogeneous condition, characterized by airway inflammation and bronchial hyperresponsiveness. We hypothesize that the different clinical presentations observed in young asthmatic children could be the result of distinct biological mechanisms, influenced by genetic predisposition and encounters with various microbes. Over the past 10 years, our research work has allowed to identify certain characteristics associated with profiles of asthmatic children. In particular, analysis of the immune response during respiratory infections in preschool children (1-5 years) revealed lower systemic levels of pro- and anti-inflammatory Th1 and Th2 cytokines, and lower antiviral responses (including interferon response) in the most severe children, who are those prone to have recurrent asthma attacks. At the end of my PhD, I had the opportunity to experience an international mobility year. I joined the "Center for Allergy and Asthma research" at Stanford University, in the US, under the supervision of Pr Kari Nadeau, and with the sponsorship of research grants including a Fulbright research grant for Hauts-de-France PhD students. We studied blood metabolomic profiles on various



Summary of the main mechanisms favoring asthma development and involved in asthma attack. These mechanisms (in red) involve: (1) impairment of innate immune responses; (2) influence of the microbiota dialog on Th2 inflammation; (3) Pathogen characteristics; (4) Airway leukocyte inflammation. These dynamic interactions may impact the presentations of asthma attacks, and have long-term consequences. AM: Alveolar macrophages; AEC: Airway epithelial cells; DC: dendritic cells; IFN: Interferon; IL: Interleukin; ILC2: type 2 innate lymphoid cells; IRF: interferon regulatory factor; PAMP: pathogen-associated molecular pattern; PRR: pattern recognition receptor; RV: Rhinovirus; TSLP: Thymic stromal lymphopoietin.

samples from children with and without asthma and atopy, including samples from the VIRASTHMA cohorts. We observed that asthma was a condition driving metabolomic profiles, and that sub-pathways associated with lipid metabolism were associated with allergic asthma. Some lipid metabolites, known to be produced by the gut microbiota, may have immunomodulatory functions and could play a key role in the development of allergic conditions during childhood. This work, showing the impact of the exposome on pediatric asthma, allowed me to acquire knowledge on bioinformatic tools and to integrate multiomic approaches in my research.

In the continuation of this work, my current and future research focuses on 3 main work packages: 1/ Deciphering the role of the airway innate immune responses against viruses during asthma attacks in young children and their involvement in the perpetuation of chronic airway inflammation; 2/ Understanding the mechanisms leading to airway remodeling and the development of severe asthma during the course of childhood; 3/ Integrating the influence of environmental factors on both the host immune responses and on viruses.

My research work is collaborative, with constant exchanges on Pasteur campus (Pr Cécile Chenivesse, Dr Patricia de Nadaï), on the university hospital campus (immunology department, virology and bacteriology units), within the G4 region (as part of the FHU "Respire"), with other French university hospitals (long-term collaboration with Necker hospital) and internationally.



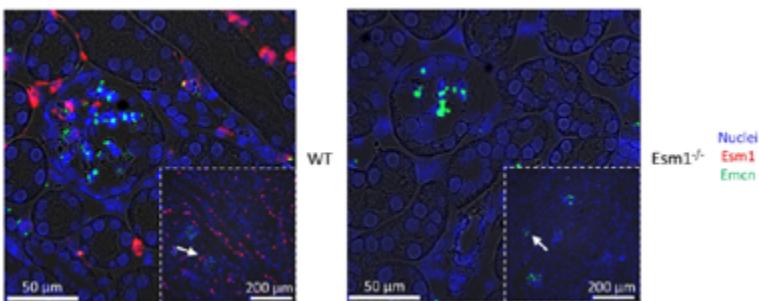
**Alexandre GAUDET**  
MCU-PH  
University of Lille/CHU of Lille

I am a physician in intensive care medicine at the Lille University Hospital and a researcher at the Center for Infection and Immunity of Lille. I had the opportunity to join the Pulmonary Immunity team led by Dr. Anne Tsicopoulos in

2014 to complete a Master's degree and a PhD under the supervision of Professor Daniel Mathieu.

My research has notably contributed to a better understanding of the biological roles of endocan and its main metabolite in human, p14, as regulators of the pulmonary inflammatory response. This project allowed me to engage in translational research, following a «bed to bedside» approach, leading to the development of clinical applications in routine care for critically ill patients.

Subsequently, I had the wonderful opportunity to undertake a post-doctoral mobility sponsored by the Fulbright program at Stanford University, California, under the mentoring of Dr. Vivek Bhalla. My research project at Stanford involved a precise anatomical and functional characterization of endothelial cells expressing endocan, through transcriptomic analysis. These efforts deepened my expertise in bioinformatics as well as assessment of molecular expression in tissues, which is a valuable asset for my ongoing research activities in France.



Characterization by RNAscope® of renal expression of the mRNA of endocan (Esm1) and of the glomerular endothelial marker Emcn in adult C57BL/6 wild-type mice (left panel) and KO endocan mice (right panel).

Since September 2022, I have been an assistant professor in intensive care medicine at the University of Lille, with research activities within the Pulmonary Immunity team, which I joined again upon my return from California to continue my research endeavors. My current projects now focus on the phenotypic characterization of inflammatory respiratory failure in critically ill patients using multi-marker approaches. Additionally, I am collaborating with Dr. Patricia de Nadaï on a study in mice investigating the long-term effects of particulate air pollution on inflammatory respiratory failure. The goal of this project is to identify specific therapeutic targets for pulmonary inflammatory responses aggravated by air pollution, with the aim of tailoring the treatment of respiratory failure in critically ill patients.

## Sandra WELLER

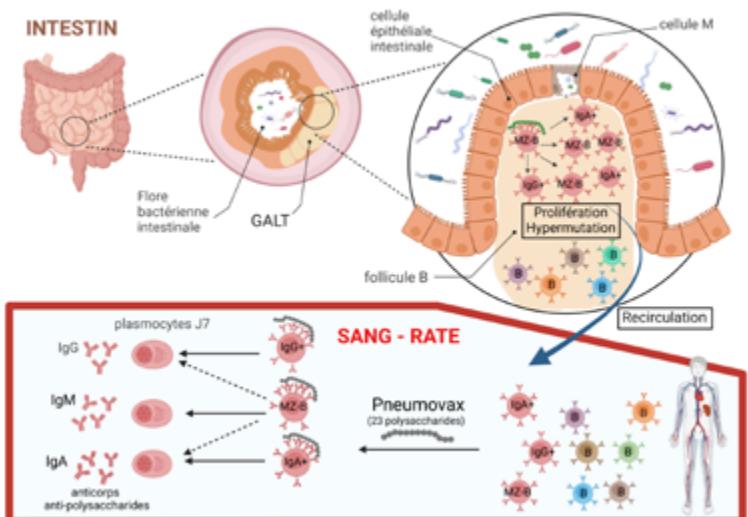
INSERM

Researcher

I come from Alsace (hopla!) and I studied at the University of Strasbourg. After completing a “Magistère” in Chemistry and Biology (in 1994), I turned my attention to immunology and B lymphocytes, working during

my doctoral thesis on a mouse model of Systemic Lupus Erythematosus, an autoimmune disease. I then completed a post-doctoral fellowship (starting in 1999) at the Institut Necker Enfants-Malades (INEM) in Paris, in the laboratory of J.-C. Weill and C.-A. Reynaud, where I have carried out most of my research to date (I was appointed CR1 INSERM in 2006). This remarkable scientific tandem was interested in the genesis of the pre-immune antibody repertoire in various species. They showed that in sheep, somatic hypermutation targeting the Immunoglobulin (Ig) genes of IgM+ B cells localized in gut-associated lymphoid tissues (GALT), generates the pre-immune B repertoire. This mechanism is used to diversify the pre-immune B repertoire in GALT in other mammals (rabbit, pig, etc.). The question was therefore whether there was a B population in humans that had retained the ability to diversify its pre-immune Ig repertoire (created by the rearrangement of Ig genes), by mechanisms that would occur in the GALT and outside an immune response. It should be noted that in humans and mice, the hypermutation mechanism had only been described in the context of T-dependent responses directed against protein antigens, and associated with the formation of germinal centres, in which the hypermutation of Ig genes takes place. This question was the starting point for my work, which focused mainly on human IgM+IgD+CD27+ B cells, and I set out to characterise this population from a phenotypic, genetic and developmental point of view. These IgM+IgD+CD27+ cells correspond to the B cells of the splenic marginal zone (MZ), and functionally, the data suggested that they could be mobilised in T-independent responses targeting, for example, bacterial capsule polysaccharides. In a recent study, in order to trace the origin of T-independent responses, I sought to identify the subpopulation(s) of B lymphocytes responsible for producing IgM, IgA and IgG anti-polysaccharide antibodies in response to vaccination with Pneumovax (a mixture of 23 pneumococcal polysaccharides which induces a T-independent response). This study was based both on high-throughput sequencing of the repertoire of antibodies expressed on the surface of B lymphocytes, and on the in vitro production of monoclonal antibodies expressed by plasma cells after vaccination, two methods that enabled us to identify anti-polysaccharide plasma cells and establish their clonal relationship with the various B sub-populations present before vaccination, and to monitor the evolution over time of B lymphocyte clones involved in the vaccine response. On the basis of this work and data from the literature, we proposed that IgM+IgD+CD27+ MZ-B cells

mutate (or prediversify) their membrane antibodies in GALT, in a process orchestrated by commensal bacteria and targeting glycans they express on their surface (Figure). This makes it possible to create a compartment of B cells in the blood, including both IgM+ B-MZ cells and clonally linked IgA+ and IgG2+ cells, with the capacity to cross-react with the polysaccharides of pathogenic encapsulated bacteria. A means of producing mutated antibodies against highly pathogenic encapsulated bacteria (meningococcus, Haemophilus influenzae, pneumococcus, etc.) in a very short space of time.



Gut associated lymphoid tissues (GALT) comprise follicles rich in B lymphocytes. M cells are specialised epithelial cells associated with these follicles, capable of sampling bacterial antigens present in the intestine. The results of the study suggest that an MZ-B cell that recognises polysaccharide bacterial antigens (thanks to its surface antibodies) can be activated, and can trigger the somatic hypermutation mechanism targeting the genes encoding its antibodies and begin to proliferate, thus giving rise to a clone of B lymphocytes. During this activation, some of the daughter cells undergo isotypic switching, enabling them to switch from expressing an IgM-type surface antibody to an IgG or IgA-type antibody. GALT B lymphocytes can recirculate in the blood and spleen. During vaccination with Pneumovax® (and by extension, during encounters with encapsulated bacteria such as pneumococcus), pre-activated and pre-mutated B lymphocytes in the GALT, whose antibodies cross-react with the polysaccharides in Pneumovax®, are activated and differentiate into plasma cells producing mutated antibodies.

Having family ties in Lille, and being very interested in the research themes developed by A. Grassart's team and its «organ-on-chip» systems, it is with great enthusiasm that I am preparing to join the CIIL at the end of 2023 to develop a human on-chip intestinal epithelium associated with B follicles, in order to identify the physiological infection pathways of *Shigella flexneri* and *Streptococcus agalactiae*.



**François MASSOL**  
**CNRS**  
**Research director**

After studying at the Ecole Polytechnique, specialising at the Ecole du Génie Rural, des Eaux et des Forêts and then obtaining a master in Ecology and Evolutionary Biology in Montpellier, I completed my PhD on the modelling of

ecological communities in the face of global change with Philippe Jarne (DR CNRS, Montpellier) and Daniel Gerdeaux (DR INRAE, Thonon-les-Bains), before continuing at Irstea (now INRAE) in Aix-en-Provence.

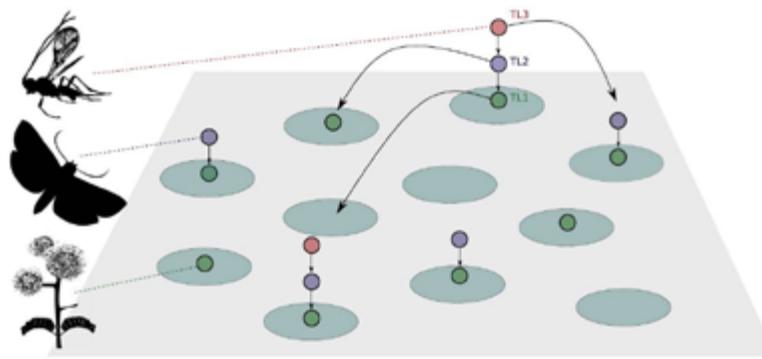
I obtained European post-doc funding (Marie Curie programme) in 2009 and spent a year working at the University of Texas at Austin with Prof. Mathew Leibold before returning to France to become a CNRS researcher at the Centre d'Écologie Fonctionnelle et Évolutive in Montpellier. In 2013, I joined the Evolution, Ecology, Palaeontology Unit in Lille and defended my HDR in 2015. I became Director of Research in 2018 and joined Priscille Brodin's team at CIIL on 1st January 2020.

I'm a researcher without a lab coat who works every day on a computer. To sum up, I could say that I do mathematics and statistics for ecology, evolution and biology in general, and sometimes even for the human sciences. To caricature, I'd say that my favourite 'toys' are models of two types:

- models that look at the evolution of the traits of species/populations/individuals in response to their environment -- for example, would a virus become more virulent if it arrived in a population of more or less mobile hosts? Historically, I have been mainly interested in the evolution of the dispersal of organisms, in other words in answering the question «why and under what conditions will organisms reproduce far from the place where they were born?». Following this work, Julien Lombard's thesis, which I am co-supervising at the CIIL (with Sébastien Lion, DR CNRS in Montpellier), aims to explore the evolution of pathogen virulence and host dispersal in order to understand how the spatial structuring of populations can affect the co-evolution of hosts and parasites;

- models of ecological interaction networks, which attempt to understand how a system made up of multiple interacting entities (who eats whom? who pollinates whom?) manages to remain stable in the face of external disturbances. In particular, this is a theme that I explored with Maxime Clenet, who defended his PhD in 2022 and whom I co-supervised with my mathematician colleague Ja-

mal Najim (DR CNRS at Marne-la-Vallée), using high-dimensional Lotka-Volterra equations. In contrast to these 'dynamic' issues, I have also been interested in the structure of networks and how to sample them. This is currently the case with the thesis of my PhD student Tâm Le Minh, who will be defending his PhD in statistics in September on the use of U-statistics to qualify similarities between bipartite networks (co-supervision with Sophie Donnet, DR INRAE, and Stéphane Robin, PR at Sorbonne University). The methods learnt and developed on this type of question in ecology can obviously be transposed to other themes.



Schematic representation of a spatial food chain model

I also do my best to contribute to the smooth running of the academic sphere as editor of the journal *Oikos*, overall manager of Peer Community in ecology, chairman of the scientific committee of the centre for biodiversity synthesis and analysis, member of the scientific council of the University of Lille and (until this year) member of section 67 of the national council of universities. Evaluating projects and colleagues therefore takes up a relatively large part of my time. I am also elected to the boards of the Société Française d'Ecologie et d'Evolution and the Collège des Sociétés Savantes Académiques de France -- associations in which I try to work for the collective academic causes that I feel are important.

And because I enjoy teaching, I'm in charge of a statistics teaching unit for a master's degree in Nice and every year I organise a 'research school' week in Montpellier on the use of models in ecology with colleagues.

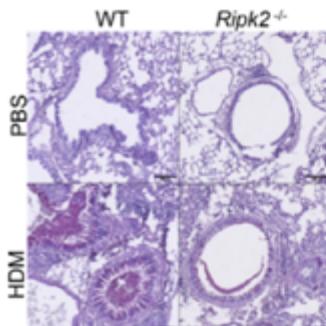
# Portrait of an engineer



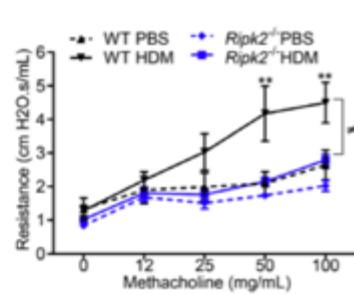
**Saliba Ait Yahia-Sendid**  
**INSERM**  
**Research engineer**

In 2007, I had the opportunity to join the U774 Inserm team (Biomolecules and pulmonary inflammation) to do an end-of-study internship as part of a specialized Master's program (Master Drug Design). After that, I had the chance to get a FRM scholarship which allowed me to continue with a PhD under the direction of Dr Anne Tsicopoulos. The team, directed by Anne Tsicopoulos is interested in the immunobiological mechanisms of asthma, in order to propose new therapeutic targets. My doctoral research work focused on the role of NOD1 receptor in exacerbating allergic asthma. NOD1 is an innate pattern-recognition sensor for Gram-negative peptidoglycan that is involved in the development of allergic asthma. In my first work we demonstrated that a NOD1 agonist used systemically behaves as an excellent adjuvant for the pulmonary Th2 response *in vivo* and exacerbates asthma. This effect was primarily mediated through the production of a pro-Th2 chemokine by dendritic cells. These findings underscored the importance of considering NOD ligands in vaccine formulations to prevent the amplification of pulmonary inflammatory responses

derstand the mechanisms involved. I evaluated whether the host's microbiota or HDM could influence asthma severity through the NOD1 receptor. We demonstrated that inhibiting NOD1 or its signaling pathway (RIPKinase 2) reduced HDM-induced asthma parameters, regardless of the host's gut microbiota. Conversely, peptidoglycans derived from the bacterial family Bartonellaceae, present in HDM, activated the NOD1 signaling pathway in epithelial cells. When HDM were depleted of peptidoglycans, they became less capable of inducing asthma. These results suggest that detection by NOD1 of specific bacteria associated with HDM exacerbates asthma severity *in vivo*, and that inhibiting this pathway could be a therapeutic approach for treating asthma. We are currently verifying the effect of RIPK2 inhibitors in a mouse model of asthma and in cultured airway epithelial cells from asthma patients.



Representative microphotographs of periodic acid-Schiff mucus-stained lung sections (red staining) in WT and Ripk2<sup>-/-</sup> mice



Airway resistances of WT and Ripk2<sup>-/-</sup> mice challenged with PBS or HDM.

in individuals. I obtained my PhD in 2012 and I became a permanent member of INSERM (Anne Tsicopoulos's team CIIL-U1019) as engineer in 2014. I participated in various studies within the team or with collaborators, which allowed, among other things, to better understand the pathology of asthma. At the same time I continued my research work, which investigated the role of NOD1 receptor in house dust mite (HDM) allergic asthma to better un-

# Life at the CIIL



## Pasteur International Unit

**Mathieu GISSOT**

CNRS

Research director



We are pleased to announce the creation of an international Pasteur unit (PIU) that aims at characterizing the molecular determinants of microtubule organizing centers' biogenesis and function in protozoan parasites.

It will group three labs of the Pasteur Institute International Network (IPIN): Maria Francia's lab (Institut Pasteur de Montevideo, Uruguay), Philippe Bastin's lab (Institut Pasteur de Paris, France) and Mathieu Gissot's lab (Institut Pasteur de Lille, France). PIUs are created after a selection process that includes a evaluation and ranking of all applications by an independent scientific committee, the CoReSciF Committee, followed by the validation from the Director of International Affairs and the Scientific Director of the Institut Pasteur. The PIU is created for 5 years and aims at fostering long term collaboration between labs of the IPIN. Our PIU was created after 5 years of student exchanges and 2 projects funded by the IPIN (an ACIP and a PTR).

We will mainly focus on trying to understand the biology and composition of centrosomes (CS) in protozoan parasites. CS are the main microtubule organizing centers of many eukaryotic cells with critical roles in cell division, polarity, signaling and structure. Centrioles can act as basal bodies (BB), nucleating microtubules to form cilia or flagella, sensory and motile organelles of vital importance for a wide range of biological functions. Protozoan parasites rely on divergent centrosomes and basal bodies to carry out essential functions related to their mechanisms of pathogenesis, which include cell division and motility. The apicomplexan parasite *Toxoplasma gondii*, causative agent of toxoplasmosis, relies on the centrosome for orchestrating its complex and divergent cell division. The physical connections between the centrosome and other structures critical for assembly of daughter cells and semi-closed nuclear mitosis timely and spatially coordinate proper cell cycle progression. *T. gondii* can also assemble flagella during its sexual differentiation into

microgametes. However, the link between the centrosome present in asexually dividing parasites, and the basal bodies nucleating flagella during gametogenesis has not been investigated. On the other hand, flagellar assembly and the role of the BB in coordinating cell division in *Trypanosoma brucei*, the causative agent of sleeping sickness, are much better understood. Nonetheless, the structural components of the BB in *T. brucei* which allow it to simultaneously coordinate its functions are ill-described. Using both protozoans as model organisms for the study of the CS and the BB for the last 5 years, our collaborative work has



identified novel components of both the CS of *T. gondii* and the BB of *T. brucei* which are critical for understanding their connection to other cytoskeletal elements. In addition, we have generated numerous tools to study the process of flagellation during microgamete generation in *T. gondii*, including endogenously tagged CS resident proteins, proximity biotinylation-able strains, and antibodies. Herein we propose to capitalize on the tools and prior knowledge we have generated to in-depth study the functional relatedness of the *T. gondii* CS and BB while deciphering the molecular basis of the switch mechanisms to sexual forms. We also propose to functionally and structurally define the localization of novel *T. brucei* BB components and its *T. gondii* homologs. Our overarching goals are to determine both the individual peculiarities as well as the shared evolutionary mechanisms that govern CS and BB biology in early branching eukaryotic pathogens.



## Sabine Blin

CNRS

Research engineer

### CIIL's new Secretary General

I am Sabine Blin. I am pleased and honoured to join CIIL as General Secretary. I

am a CNRS agent, research engineer of the BAP J.

While waiting to meet you and make your acquaintance, I introduce myself to you.

After obtaining a master's degree in private law and procedural law, I chose to join the army to be an officer. Also, at the end of my training at the schools of Saint-Cyr Coetquidan, I had the honor to serve in commando units, paratroopers and in headquarter : the National Training Center Commando de Mont-Louis, the 3rd Muret Materiel Regiment and the Army Human Resources Directorate in Paris and Tours. I carried out my missions as an officer while exercising a position as a lawyer in international law and as director of human resources. From my 15-year military career, I have moving memories of real friendship and surpassing myself, difficult moments that undoubtedly forged my character and taught me to appreciate the little joys of life. When I reached the rank of commander, I made the choice to leave the uniform to enjoy my family. Indeed, I am married and mother of 3 teenagers today aged 17 and 16 for twins.

The second part of my career is interministerial. First, I was in charge of modernization in the context of the creation of the new academic region of Hauts-de-France. It was necessary to write the roadmap and the scope of action of this new entity of the national education, by making collaborate many interlocutors.

Then, I joined the regional delegation of Hauts-de-France of the CNRS, on the position of human resources manager. I was then appointed as a part-time project manager, for the professionalization of the HR sector, with the CNRS HRD.

Next, I was in charge of supporting the reform of the territorial organization of the State; I was then HR advisor for the regional prefect.

Finally, I am currently Assistant Secretary General in the Regional Directorate of Cultural Affairs where my missions are to ensure the application of administrative and financial guidelines, coordinate the action of the various departments and forward information to management.

As of November 1st, I will have the pleasure of meeting you and finding the research community that is dear to me in order to help create favourable working conditions for our collective work. I look forward to starting new and great professional adventures with you.

## A new chapter begins for our three scientists



### Anne Tsicopoulos

Towards new horizons ...

An allergist, passionate about medical research, Anne Tsicopoulos began her scientific career in the 1980s studying the low affinity receptor for IgE which had just been discovered.

Indeed, the 1970s were marked by the discovery and characterization of IgE (formerly reagins) and their high affinity receptor on the surface of mast cells and basophils. At the beginning of the 1980s Professor Capron's team, at Lille Pasteur Institute, discovered the existence of a low affinity receptor on the surface of non-mast cell inflammation cells. This discovery, resulting from research on the mechanisms of protection against parasites, was of particular interest in allergology: shedding new light on the inflammatory mechanisms, hyperreactivity and bronchial remodeling observed in asthma.

Anne's early work showed that anti-allergy drugs such as sodium cromoglycate, known to inhibit IgE-dependent mast cell degranulation, were also capable of inhibiting IgE-dependent activation of non-mast cell inflammatory cells. This was the subject of her PhD. At the beginning of the 90s, Anne left for a post-doc in London with Barry Kay. She came back with the demonstration of the presence of Th2 cells in the bronchoalveolar lavage of asthmatics and the production of pro-inflammatory cytokines involved in bronchial hyperreactivity by their tissue eosinophils, a work published in *New Engl J Med* and *J Exp Med*!

Anne became an INSERM research fellow in 1992. She joined INSERM unit U416 directed by Professor André-Bernard TONNEL, a research unit entirely focused on the dissection of immune-allergic mechanisms. She analyzed the immune-allergic reaction in the skin of atopic subjects and modeled it in human skin grafted SCID mouse reconstituted with lymphocytes from the same donor. A feat! This work has earned her numerous publications and intensive student supervision made up of young doctors and scientists. Anne became Research Director in 2002.

In the 2000s, Anne gradually became interested in the role of the environment and innate immunity in the control of the immuno-allergic reaction and bronchial remodeling. First, in the INSERM unit U774, then in 2010 in the CIIL U1019, where she took charge of a team called Pulmonary Immunity. She highlighted the exacerbating role of atmospheric pollution and that of the cytokine IL-22 involved in bronchial remodeling. More recently, Anne has become interested in the role of innate immunity, particularly ILC2s, in the control of the circadian rhythm.

Anne's rich medical and scientific production has earned her numerous awards and invitations to speak at conferences. During

her career, Anne has taken great care to bring together researchers and clinicians with the aim of better contributing to the progress of medicine. We wish her an excellent retirement!

Cécile CHENIVESSE  
Philippe LASSALLE



**Corine GLINEUR**

After 37 years at the Institut Pasteur in Lille, Corine Glineur has left the world of research to start a new life as a retiree. She has been a passionate researcher with a highly diversified career in the fields of cancer, microbiology, cardiovascular diseases and immunoinflammatory lung diseases. We wish her to enjoy her new retirement adventures.

## Dominique RAZE

**Dominique Raze** ('Domi' for all those who know him here) arrived in Lille in 1994 with a PhD in Botany from ULiège. His thesis was devoted to peptidoglycan synthesis in bacteria, not plants, so it was natural that he joined Camille Locht's CJF to work on *Bordetella pertussis*. Domi was

initially recruited as a post-doc. The team grew, evolved into U447 and then U629, and Domi obtained a position as a research engineer at INSERM. To everyone's delight, he decided to continue his career in Lille. Domi soon proved indispensable to the laboratory, with his multiple skills in bacteriology, computer science and molecular biology, to name but a few. He always loved to mulch, too. Domi was there to advise, help, lend a hand, do a little DIY, or tame a computer when needed... He managed the tour de force of working on our two favorite pathogens, *Bordetella* and *Mycobacterium*, with a fine series of publications to his credit. His cheerfulness, sense of humor, helpfulness and ability to forge links quickly made him a well-known - and above all, much-appreciated - figure on campus. He was our point of contact with the sales staff, with whom his patience and tact worked wonders, and was CIIL's Inserm training correspondent. As the years went by, Domi moved up the ladder. He became a research engineer, co-directing and supervising the day-to-day work of two PhD students and several post-docs in the laboratory. He has also sat on engineering recruitment panels at Inserm.

Domi loves life and all it has to offer, and has always been keen to surpass the limits it has imposed on him. Recently, he developed a passion for gliding. Now a pilot himself, he has made us all dream with his photos of the glaciers of the Alps taken from the sky. In fact, it's partly in the Alps that he plans to enjoy his retirement, which we wish him long and happy...

Françoise JACOB-DUBUSSON  
Anne-Sophie DEBRIE



As every year, the CIIL was present at the Fête de la Science from October 5 to 8. Thanks to our PhD students Lou, Julien, Victor, Yoël, Guillaume, Amine and our researchers Céline, Odile, Cécile, Muriel and Patricia for their involvement in the organization of the booth and their commitment to children and the general public:



Credit : P. DE-NADAI



# The news in brief ... ...

## Welcome to our new thesis students



**Cécilia SOBIESKI**  
Dir. : R. Hartkoorn  
Team. HARTKOORN

**Wang CHEN**  
Dir. : V. Agouridas  
Team MELNYK



**Constance DENOYELLE**

Dir. : E. Viscogliosi & M. Chabé  
Team : VISCOGLIOSI



**Yoel DAGAN**

Dir. : P. Brodin & A. Grassart  
Team. BRODIN & GRASSART



**Dacine OSMANI**  
Dir. : N. Mielcarek & L. Coutte  
Team. MIELCAREK

**Manon RYCKMAN**  
Dir. : G. Certad  
Team. VISCOGLIOSI



**Guillaume CAMUS**

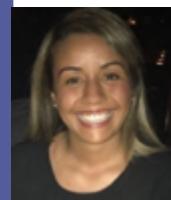
Dir. : N. Mielcarek  
Team. MIELCAREK



## New recruitments



**Joan FINE**  
Dir. : A. Machelart  
Team BRODIN & TROTTEIN



CIIL's admin department has just been reinforced by the arrival of Aicha EL KIRAT, IPL account manager.



**Léa MÉZIÈRE**  
Dir. : L. Cocquerel  
Team DUBUSSON



From October 16: Aurélie PARMENTIER-DJEMAT, will join Oleg MELNYK's team to replace Marie-José GHORIS to take care of the molluscarium.



**Manuel LONIGRO**  
Dir. : D. Devos  
Team DEVOS

**Lisa SACHET**

Dir. : J.C. Sirard  
Team SIRARD



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