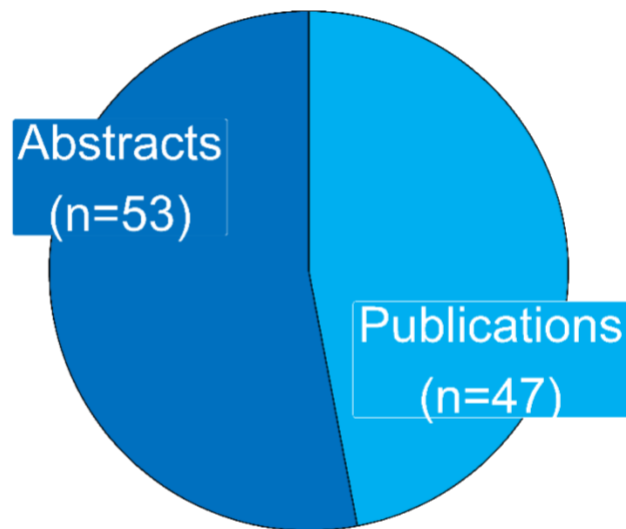


# Montreal Children's Hospital Neonatal Intensive Care Unit Research publications and presentations 2020



# List of Publications

## 1. Decision to extubate extremely preterm infants: art, science or gamble?

*Shalish W, Keszler M, Davis PG, Sant'Anna GM.*  
Arch Dis Child Fetal Neonatal Ed. 2021 Feb  
24:fetalneonatal-2020-321282. doi:  
10.1136/archdischild-2020-321282. Online ahead of  
print. PMID: 33627331 Review.

## 3. Rhesus disease in Brazil: A multi-professional national survey

*Variante GF, Sant'Anna GM.*  
Semin Perinatol. 2021 Feb;45(1):151357. doi:  
10.1016/j.seperi.2020.151357. Epub 2020 Dec  
PMID: 33309010

## 5. "Optimal surfactant delivery protocol using the bovine lipid extract surfactant: a quality improvement study"

*Germain A, Nouraeyan N, Claveau M, Leone M, Sant'Anna G.*  
J Perinatol. 2021 Jan;41(1):17-23. doi:  
10.1038/s41372-020-00846-1. Epub 2020 Oct 3.  
PMID: 33011749 Free PMC article.

## 7. Neonatal COVID-19: little evidence and the need for more information

*Procianoy RS, Silveira RC, Manzoni P, Sant'Anna G.*  
J Pediatr (Rio J). 2020 May-Jun;96(3):269-272. doi:  
10.1016/j.jped.2020.04.002. Epub 2020 Apr 11.  
PMID: 32298645 Free PMC article. No abstract  
available.

## 9. Cardiorespiratory behavior of preterm infants receiving continuous positive airway pressure and

## 2. Diaphragmatic activity and neural breathing variability during a 5-min endotracheal continuous positive airway pressure trial in extremely preterm infants

*Latremouille S, Bhuller M, Rao S, Shalish W, Sant'Anna G.*  
Pediatr Res. 2020 Sep 17:1-8. doi: 10.1038/s41390-  
020-01159-x. Online ahead of print.  
PMID: 32942291 Free PMC article.

## 4. Prophylaxis for ophthalmia neonatorum in Brazil: A snapshot using a multi-professional national survey

*Miralha AL, Chermont AG, Orlandi PP, Rugolo LS, Sant'Anna G.*  
J Neonatal Perinatal Med. 2020 Sep 4. doi:  
10.3233/NPM-200503. Online ahead of print.  
PMID: 32894255

## 6. COVID-19 and Neonatal Respiratory Care: Current Evidence and Practical Approach

*Shalish W, Lakshminrusimha S, Manzoni P, Keszler M, Sant'Anna GM.*  
Am J Perinatol. 2020 Jun;37(8):780-791. doi:  
10.1055/s-0040-1710522. Epub 2020 May 2.  
PMID: 32359226 Free PMC article. Review.

## 8. Assessment of Extubation Readiness Using Spontaneous Breathing Trials in Extremely Preterm Neonates

*Shalish W, Kanbar L, Kovacs L, Chawla S, Keszler M, Rao S, Latremouille S, Precup D, Brown K, Kearney RE, Sant'Anna GM.*  
JAMA Pediatr. 2020 Feb 1;174(2):178-185. doi:  
10.1001/jamapediatrics.2019.4868.  
PMID: 31860014 Free PMC article.

## 10. Location and Size of Preterm Cerebellar Hemorrhage and Childhood Development

## high flow nasal cannula post extubation: randomized crossover study

*Kanbar LJ, Shalish W, Latremouille S, Rao S, Brown KA, Kearney RE, Sant'Anna GM.* *Pediatr Res.* 2020 Jan;87(1):62-68. doi: 10.1038/s41390-019-0494-5. Epub 2019 Jul 5. PMID: 31277077 Free PMC article. Clinical Trial.

## 11. Pregnancy and COVID-19: Pharmacologic Considerations

*D'Souza R, Ashraf R, Rowe H, Zipursky J, Clarfield L, Maxwell C, Arzola C, Lapinsky S, Paquette K, Murthy S, Cheng MP, Malhamé I.* *Ultrasound Obstet Gynecol.* 2020 Sep 21;57(2):195-203

## 13. Adjunctive Daptomycin in the Treatment of Methicillin-Susceptible Staphylococcus aureus Bacteremia: A Randomized Controlled Trial

*Cheng MP, Lawandi A, Butler-Laporte G, De L'Étoile-Morel S, Paquette K, Lee TC.* *Clin Infect Dis.* 2020 Jul 15;ciaa1000.

## 15. Increased incidence but lack of association between cardiovascular risk factors in adults born preterm suggest different pathophysiological pathways.

*Flahault A, Paquette K, Fernandes R, Delfrate J, Cloutier A, Henderson M, Lavoie JC, Mâsse B, Nuyt AM, Luu TM.* *Hypertension.* 2020 Mar;75(3):796-805.

## 17. Effect of an integrated neonatal care kit on cause-specific neonatal mortality in rural Pakistan

*Duby J, Pell LG, Ariff S, Khan A, Bhutta A, Farrar DS, Bassani DG, Hussain M, Bhutta ZA, Soofi S, Morris SK.* *Global Health Action.* 2020 13:1: 1802952

*Garfinkle J, Guo T, Synnes A, Chau V, Branson HM, Ufkes S, Tam EWY, Grunau RE, Miller SP.* *Ann Neurol.* 2020 Dec;88(6):1095-1108. doi: 10.1002/ana.25899. Epub 2020 Oct 1. PMID: 32920831.

## 12. Respiratory Syndrome-Related CORONAVIRUS-2 A Narrative Review.

*Cheng MP, Yansouni C, Basta N, Desjardins M, Kanjilal S, Paquette K, Caya C, Semret M, Quach C, Libman M, Mazzola L, Sacks JA, Dittrich S, Papenburg J.* *Serodiagnostics for Severe Acute Ann Intern Med.* 2020 Sep 15;173(6):450-460.

## 14. Real-world Time to Positivity of 2 Widely Used Commercial Blood Culture Systems in Patients with Severe Manifestations of Sepsis: an Analysis of the FABLED Study

*Butler-Laporte G, Yansouni C, Paquette K, Lawandi A, Stabler SN, Akhter M, Davidson AC, Gavric M, Jinah R, Saeed Z, Demir K, Sangsari S, Huang K, Mahpour A, Shamatutu C, Caya C, Troquet JM, Clark G, Wong T, Lee TC, Stenstrom R, Sweet D, Cheng MP for the FABLED investigators.* *Open Forum Infect Dis.* 2020 Aug 23;7(9):ofaa371

## 16. Blood Culture Results Before and After Antimicrobial Administration.

*Cheng MP, Stenstrom R, Paquette K, Yansouni C, Sweet D, for the FABLED investigators.* *Ann Intern Med.* 2020 Mar 17;172(6):440-441.

## 18. Decline in the incidence of neonatal sepsis in rural Gadchiroli, India during the twenty-one years (1998-2019) following the Home-Based Neonatal Care field trial

*Bang A, Deshmukh M, Baitule S, Duby J.* Provisionally accepted to *Pediatric Infectious Disease Journal.* 2021

**19. The utility of arterial spin labeling (ASL) in the pre-surgical evaluation of poorly-defined focal epilepsy in children**

*Lam J, Tomaszewski P, Gilbert G, Moreau JT, Guiot MC, Albrecht S, Farmer JP, Atkinson J, SaintMartin C, Wintermark P, Bernhardt B, Baillet S, Dudley RWR.* Accepted in Journal of Neurosurgery: Pediatrics

**21. Cardiovascular management following hypoxic ischemic encephalopathy in North America: Need for physiologic consideration**

*Giesinger RE, Levy PT, Ruoss LW, El Dib M, Mohammad K, Wintermark P, McNamara PJ.* *Pediatr Res.* 2020 [Epub ahead of print]. doi: 10.1038/s41390-020-01205-8.

**23. Asphyxiated neonates treated with hypothermia: Birth place matters**

*Sabsabi B, Huet C, Rampakakis E, Beltempo M, Brown R, Lodygensky GA, Piedboeuf B, Wintermark P.* *Am J Perinatol.* 2020 [Epub ahead of print]. doi: 10.1055/s-0040-1715823. IF = 2.07

**25. Neonates with hypoxic-ischemic encephalopathy treated with hypothermia: Observations in a large Canadian population and determinants of death and/or brain injury**

*Xu EH, Claveau M, Yoon E, Barrington KJ, Mohammad K, Shah P, Wintermark P; on behalf of the Canadian Neonatal Network (CNN).* *J Neonatal Perinatal Med.* 2020 [Epub ahead of print]. doi: 10.3233/NPM-190368.

**20. Association of location of intubation procedure and number of tracheal intubation attempts with death or severe neurological injury among very preterm infants**

*Debay A, Patel S, Wintermark P, Claveau M, Olivier F, Beltempo M.* *Am J Perinatol.* 2020 [Epub ahead of print]. doi: 10.1055/s-0040-1718577.

**22. Reduced fractional anisotropy in projection, association, and commissural fiber networks in neonates with prenatal methamphetamine exposure**

*Warton FL, Taylor PA, Warton CMR, Molteno CD, Wintermark P, Zöllei L, van der Kouwe AJ, Jacobson JL, Jacobson SW, Meintjes EM.* *Dev Neurobiol.* 2020 [Epub ahead of print]. doi: 10.1002/dneu.22784.

**24. Death after birth asphyxia in the cooling era.**

*Al Amrani F, Racine E, Shevell M, Wintermark P.* *J Pediatr.* 2020 [Epub ahead of print]. doi: 10.1016/j.jpeds.2020.07.041. IF = 3.79 7.

**26. Therapeutic interventions for fetal inflammatory response syndrome (FIRS)**

*Ying X, Wintermark P.* *Semin Fetal Neonatal Med.* 2020; 101112. doi: 10.1016/j.siny.2020.101112. [Invited Review].

### **27. Nurturing and quiet intervention (NeuroN-QI) on preterm infants' neurodevelopment and maternal stress and anxiety: A pilot randomized clinical trial protocol**

*Aita M, Héon M, Lavallée A, De Clifford Faugère G, Altit G, Le May S, Dorval V, Lippé S, Larone Juneau A, Remmer E, Rennick JE.* J Adv Nurs. 2021 Mar 14. doi: 10.1111/jan.14819. Epub ahead of print. PMID: 33719093.

### **29. Cardiopulmonary Function Abnormalities in Cohort of Adults following Bronchopulmonary Dysplasia as Preterm Infants**

*Lasry A, Kavabushi P, Canakis AM, Luu TM, Nuyt AM, Perreault T, Simoneau J, Landry J, Altit G.* Am J Perinatol. 2021 Jan 17. doi: 10.1055/s-0040-1722604. Epub ahead of print. PMID: 33454944.

### **31. Management of chronic pulmonary hypertension in neonates with bronchopulmonary dysplasia: perspectives of neonatologists with hemodynamic expertise and pediatric cardiologists**

*Hébert A, Drolet C, Altit G, Villeneuve A, Lapointe A, Bensouda B, Giesinger RE, McNamara PJ.* J Perinatol. 2020 Nov;40(11):1726-1728. doi: 10.1038/s41372-020-00791-z. Epub 2020 Aug 16. PMID: 32801352

### **33. Perceptual cognitive training does not improve concussion symptoms at 4 and 12-weeks post-injury in children and adolescents: A randomized controlled trial**

*Teel, E.F, Brossard-Racine, M, Corbin-Berrigan, L.A, & Gagnon, I.J.* (2020). Journal of Head Trauma Rehabilitation.

### **35. Characterizing the subcortical structures in youth with congenital heart disease**

*Fontes, K, Courtin, F, Rohlicek, C, Saint-Martin, C, Gilbert, G, Easson, K, Majnemer, A, Marelli, A, Chakravarty, M.M., & Brossard-Racine, M.* (2020). American Journal of Neuroradiology. 41(8), 1503-1508.

### **28. Association of bronchopulmonary dysplasia and right ventricle systolic function in young adults born preterm**

*Dartora DR, Flahault A, Luu TM, Cloutier A, Simoneau J, White M, Lapointe A, Villeneuve A, Bigras JL, Altit G, Nuyt AM.* Chest. 2021 Feb 4:S0012-3692(21)00253-1. doi: 10.1016/j.chest.2021.01.079. Epub ahead of print. PMID: 33549599.

### **30. Renal functional markers in extremely premature infants with and without twin-twin transfusion syndrome**

*Sommer J, Nuyt AM, Audibert F, Dorval V, Wavrant S, Lapointe A, Altit G.* J Perinatol. 2020 Feb;40(2):256-262. doi: 10.1038/s41372-019-0524-5. Epub 2019 Oct 15. PMID: 31616050.

### **32. Comprehensive Echocardiographic Assessment of Ventricular Function and Pulmonary Pressure in the Neonatal Omphalocele Population**

*Dal Col AK, Bhombal S, Tacy TA, Hintz SR, Feinstein J, Altit G.* Am J Perinatol. 2020 Mar 20. doi: 10.1055/s-0040-1708048. Epub ahead of print. PMID: 32198744.

### **34. Motor impairments in children with congenital heart defects: A Systematic review**

*Bolduc, M.E, Dionne, E, Gagnon, I, Rennick, J, Majnemer, A, & Brossard-Racine, M.* (2020). Pediatrics. 146 (6) e20200083.

### **36. Altered local cerebellar and brainstem development in preterm infants**

*Wu, Y., Stoodley, C., Brossard-Racine, M., Kapse, K., Vezina, G., Murnick, J., du Plessis, A.J., & Limperopoulos, C.* (2020). NeuroImage, 213, 116702.

**37. Quantification of apparent axon density and orientation dispersion in the white matter of youth born with congenital heart disease.**

*Easson, K, Rohlicek, C, Houde, J.C, Gilbert, G, Saint-Martin, C, Fontes, K, Majnemer, A, Marelli, A, Wintermark, P, Descoteaux, M, & Brossard-Racine, M.* (2020). *NeuroImage*, 205, 116225.

**39. Impact of decreasing CSF enterovirus PCR turnaround time on hospitalization care and costs.**

*Alghounaim M, Caya C, Cho M, Beltempo M, Yansouni C, Dendukuri N, Papenburg J.* *Eur J Clin Microbiol Infect Dis.* 2020 Jan 13.

**41. Pressure versus sudden wean from nasal continuous airway pressure in premature infants: a systematic review and meta-analysis.**

*Lemieux-Bourque C, Piedboeuf B, Fontela P, Bornais K, Beltempo M.* [published online ahead of print, 2020 Jun 24]. *Neonatology.* 2020;1-8.

**43. Characteristics and outcomes of preterm neonates according to doses of surfactant received.**

*Coshal H, Mukerji A, Lemyre B, Ng E, Alvaro R, Ethier G, Yoon E, Beltempo M, Shah P.* *J Perinatol.* 2020;1-8. doi:10.1038/s41372-020-00779-9

**45. Costs of Care of Preterm Neonates in Canadian Neonatal Intensive Care Units**

*Rios J, Shah P, Beltempo M, Lee S, Mukerji A, Premji S, Lewis D, Shah V, Pechlivanoglou P.* *J Pediatr.* 2020 Sep 23:S0022-3476(20)31178-1. doi: 10.1016/j.jpeds.2020.09.045. Epub ahead of print.

**47. Défendre les intérêts des enfants tout en maximisant les ressources médicales dans le**

**38. Outcomes and care practices for preterm infants born at less than 33 weeks' gestation: a quality-improvement study**

*Lee S, Beltempo M (\*co-first), McMillan D, Seshia M, Singhal N, Dow K, Aziz K, Piedboeuf B, Shah P, on behalf of the Canadian EPIQ study Group.* *CMAJ.* 2020 Jan; 192(4): E81–E91.

**40. Infections and Nursing Overtime in a Neonatal Intensive Care Unit: A Bayesian Semiparametric Panel Data Logit Model.**

*Beltempo M, Bresson G, Etienne J-M, Lacroix G.* IZA Institute of Labor Economics Discussion Paper Series. 2020 March; IZA DP 13056.

**42. Interaction of chorioamnionitis with obstetrical, maternal and fetal predictors of neonatal mortality: a population-based cohort study.**

*Zaki D, Balayla J, Beltempo M, Gazil G, Nuyt AM, Boucoiran I.* *BMC Pregnancy and Childbirth.* 20, 454 (2020).

**44. Comparison of three nursing workload assessment tools in the neonatal intensive care unit and their association with outcomes of very preterm infants**

*Lemieux-Bourque C, Pieboeuf B, Gignac S, Taylor-Ducharme S, Julien AS, Beltempo M.* *Am J Perinatol.* 2020 Oct 14. doi: 10.1055/s-0040-1718571. Online ahead of print.

**46. Canadian Neonatal Network Annual Report 2019**

*Beltempo M (Chair), DaSilva O, Deshpandey A, Dunn M, Seildlitz W, Ting J, Shah P on behalf of the Canadian Neonatal Network.* Toronto, ON, Canada. October 2020.

**context de la pandémie de COVID-19 au Québec :  
l'allocation des lits de soins intensifs (SI) et  
respirateurs pédiatriques dans le contexte de la  
pandémie de COVID-19 au Québec.**

*Gaucher N, Payot A, Dupont-Thibodeau A,  
Bouthiller ME. Comité de Néonatalogie (6 membres  
incluant **Beltempo M**). Montréal, QC, Canada.  
Novembre 2020.*



# List of Abstracts

## Pediatric Academic Society 2020

1. Latremouille S, Bhuller M, **Shalish W, Sant'Anna GM**. Diaphragmatic activity and respiratory variability of extremely preterm infants receiving CPAP, NIPPV, and NIV-NAVA: a randomized crossover trial. Poster presentation at the Pediatric Academic Societies meeting, Philadelphia, USA. E-PAS: (May 2020)
2. **Barbosa de Oliveira C, Shalish W, Latremouille S, Sant'Anna GM**. Early and protocolized use of bubble continuous positive airway pressure decreased rates of intubation, surfactant use, and early death/severe BPD in extremely preterm infants: a 4-year single center experience. Poster presentation at the Pediatric Academic Societies meeting, Philadelphia, USA. E-PAS: (May 2020).
3. Alarcon Martinez T, Latremouille S, Kanbar L, **Kovacs L, Kearney RE, Sant'Anna GM, Shalish W**. Criteria for reintubation of extremely preterm infants: Which ones best reflect clinical practice? Poster presentation at the Pediatric Academic Societies meeting, Philadelphia, USA. E-PAS: (May 2020).
4. Germain A, **Nouraeyan N, Claveau M, Leone M, Sant'Anna GM**. Optimal Surfactant Delivery Protocol Using the Bovine Lipid Extract Surfactant. Poster presentation at the Pediatric Academic Societies meeting, Philadelphia, USA. E-PAS: (May 2020).
5. Soullane S, Patel S, **Claveau M, Wazneh L, Sant'Anna GM, Beltempo M**. Fluid and sodium status in the first 10 days of life and death/bronchopulmonary dysplasia in very preterm infants. Poster presentation at the Pediatric Academic Societies meeting, Philadelphia, USA. E-PAS: (May 2020).
6. Giesinger RE, Levy PT, Ruoss L, El Dib M, Mohammad K, **Wintermark P, McNamara PJ**. Cardiovascular management of neonates with neonatal encephalopathy undergoing therapeutic hypothermia across North America: Influence of Targeted Neonatal Echocardiography. Pediatric Academic Societies' (PAS) Annual Meeting 2020, April 29th–May 6th, 2020, Philadelphia, USA. [Submitted] Canceled because of COVID-19.
7. Debay A, Patel S, Wintermark P, Claveau M, Olivier F, **Beltempo M**. Association of location of intubation procedure and number of tracheal intubation attempts with death or severe neurological injury among very preterm infants. Pediatric Academic Societies' (PAS) Annual Meeting 2020, April 29th–May 6th, 2020, Philadelphia, USA. [Submitted] Canceled because of COVID-19.
8. Fillion-Ouellet E, Shah P, Ye X, Lapointe A, Cieslak Z, **Beltempo M**. Cumulative effect of Prevention Intervention on outcomes of preterm infants <29 weeks of gestational age. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS2020:3935.635
9. Yurkiw K, Alshaikh B, Louis D, Emberley J, Claveau M, **Beltempo M, Kamran Y**. Neonatal outcomes of twins less than 33 weeks gestation born to mothers with hypertensive disorders of pregnancy and normotensive pregnancies. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS:1441.695
10. Seaton S, Draper E, Adams M, Kusuda S, Hakansson S, Helenius K, Reichman B, Lehtonen L, Bassler D, Lee SK, Vento M, Darlow B, Rusconi F, **Beltempo M, Isayama T, Lui K, Norman M, Manktelow B, Shah P, Modi N**. Variations in length of stay for infants born at 24-31 weeks' gestation: an international comparison study. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS2020:2270.7
11. Coshal H, **Beltempo M, Mukerji A, Lemyre B, Ng E, Alvaro R, Ethier G, Yoon E, Shah P**. Characteristics and outcomes of preterm neonates according to doses of surfactant received. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS2020:4140.724



12. **Beltempo M**, Ye XY, Joseph KS, Synnes A, Pasquier J-C, Piedboeuf B, Bacchini, Shah P. Socioeconomic disparities in healthcare resource use following neonatal discharge of preterm infants in Canada. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS2020:4118.331
13. Rizzolo A, Shah P, Bertelle V, Makary H, Piedboeuf B, **Beltempo M**. Association of hour of admission with mortality among preterm infants born in Canada. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS2020:2839.639
14. Shah P, Yang J, Synnes A, Kelly E, DaSilva O, Monterrosa L, **Beltempo M**. The Association of Residential Area-Level Dependency as Marker of Marginalization and Neurodevelopmental Outcomes of Preterm Infants of < 29 Weeks' Gestation. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS2020:4118.341
15. Roychoudhury S, Abou Mehrem A, Soraisham A, Lodha A, Synnes A, **Beltempo M**, Shah P, Banihani R, Yang J, Canning R. Neurodevelopment outcomes of preterm infants <29 weeks gestational age conceived by assisted reproductive technology. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS2020:2270.10
16. **Altit G**, Saeed S, Lapointe A, **Beltempo M**, **Claveau M**, Basso O. Outcomes of extremely premature infants comparing patent ductus arteriosus management approaches. Pediatric Academic Societies Annual Meeting. Philadelphia, PA, USA. E-PAS2020:1428.461
17. "The burden of bronchopulmonary dysplasia and pulmonary vascular disease in premature infants" (accepted, oral presentation). **Altit, G**

## Canadian Pediatric Society 2020

1. **Correa Salustiano MH**, **Asselin S**, **Olivier F**, Patel S, **Beltempo M**. DUNN method versus weight based formulae to estimate umbilical arterial and venous catheters position. Canadian Paediatrics Society 97th Annual Conference. Vancouver, BC, Canada. June 2020. Paediatr Child Health. 2020;25(s2)e13-e14.
2. Debay A, Patel S, **Wintermark P**, **Claveau M**, **Olivier F**, **Beltempo M**. Association of location of intubation procedure and number of tracheal intubation attempts with outcomes of very preterm infants. Canadian Paediatrics Society 97th Annual Conference. Vancouver, BC, Canada. June 2020. Paediatr Child Health. 2020;25(s2)e9.
3. Soullane S, Patel S, **Santanna G**, **Claveau M**, **Wazneh L**, **Beltempo M**. Association of serum sodium concentration, fluid balance and weight loss with bronchopulmonary dysplasia in very preterm infants. Canadian Paediatrics Society 97th Annual Conference. Vancouver, BC, Canada. June 2020. Paediatr Child Health. 2020;25(s2)e10-e11.

## Congrès provincial de la recherche mère-enfant

1. Busque AA, Patel S, Jabbour E, **Couture É**, **Garfinkle J**, **Khairy M**, **Claveau M**, **Beltempo M**. Incidence and risk factors for autism spectrum disorder among preterm infants <29 weeks' gestation. Congrès provincial de la recherche mère-enfant, Montreal, QC, Canada. October 2020.
2. LeBlanc G, Patel S, Jabbour E, **Olivier F**, **Zeid M**, **Kazansteva O**, **Beltempo M**. Organizational risk factors and clinical impacts of unplanned extubations among infants in the neonatal intensive care unit. Congrès provincial de la recherche mère-enfant, Montreal, QC, Canada. October 2020
3. **Li Ching Ng L**, Patel S, **Paquette K**, Filion-Ouellet E, Plourde H, **Besner ME**, **Beltempo M**. Impact of sequential implementation of a standardized feeding protocol and donor breastmilk on necrotizing enterocolitis among preterm infants born <31 weeks gestation. Congrès provincial de la recherche mère-enfant, Montreal, QC, Canada. October 2020.
4. Patel S, **Martel-Bucci A**, **Wintermark P**, **Shalish W**, **Claveau M**, **Beltempo M**. Timing and frequency of screening cranial ultrasounds to identify severe neurological injury among very preterm infants.

Congrès provincial de la recherche mère-enfant, Montreal, QC, Canada. October 2020. (Best presentation award)

- Attari Z, Patel S, Saeed S, Drolet C, Bizgu V, Charbonneau L, Lapointe A, Massé E, Platt R, Piedboeuf B, **Beltempo M**. The Association of Neonatal Intensive Care Unit Design Change and Move with Neonatal Outcomes – A Multicentre Study. Congrès provincial de la recherche mère-enfant, Montreal, QC, Canada. October 2020. (Best presentation award)
- Howidi B, Yazdani A, Khoja Z, **Wintermark P**. The effects of sildenafil treatment on neurons, synapses and axons after neonatal hypoxia-ischemia. 4th Provincial Mère-Enfant Research Day, October 29-30, 2020, Quebec City, Canada. [virtual]
- Dionne, E.\*, Bolduc, ME.\*, Majnemer, A., Beauchamp, M., & **Brossard-Racine, M.** (October 29th, 2020). Academic challenges in Developmental Coordination Disorder: A systematic review and meta-analysis. Poster presented virtually at 4<sup>e</sup> édition du Congrès Provincial de la Recherche Mère-Enfant. Virtual conference due to COVID-19 pandemic.
- Bolduc, ME.\*, Rennick, J., Gagnon, I., **Brossard-Racine, M.**, Majnemer, A., (October 29th, 2020). Developmental Follow-up Practices for Children with Congenital Heart Defects: A National Environmental Scan. Poster presented virtually at 4<sup>e</sup> édition du Congrès Provincial de la Recherche Mère-Enfant, Quebec, QC, Virtual conference due to COVID-19 pandemic.
- Fezoua A, Jung S, Lachapelle P, **Wintermark P**. Diffusion-tensor imaging measurements of the occiput are correlated with visual evoked potential amplitude in term asphyxiated neonates treated with hypothermia. 4th Provincial Mère-Enfant Research Day, October 29-30, 2020, Quebec City, Canada. [Virtual oral presentation]

## Canadian National Perinatal Research Meeting

- Debay A, Patel S, **Wintermark P, Claveau M, Olivier F, Beltempo M**. Association of location of intubation procedure and number of tracheal intubation attempts with death or severe neurological injury among very preterm infants. 2020 7th Canadian National Perinatal Research Meeting (CNPRM), February 12-15th, 2020, Banff, Canada. [Poster]
- Soullane S, Patel S, **Santanna G, Claveau M, Wazneh L, Beltempo M**. Association of fluid Balance and weight change with outcomes in very Preterm Infants. 7th Canadian National Perinatal Research Meeting. Banff, AB, Canada. February 2020.
- Lemieux-Bourque C, Pieboeuf B, **Gignac S, Taylor-Ducharme S, Julien AS, Beltempo M**. Comparison of three nurse-to-patient ratio scores in the neonatal intensive care unit and their association with outcomes of very preterm infants. 7th Canadian National Perinatal Research Meeting. Banff, AB, Canada. February 2020.
- Grabovac M, **Beltempo M**, Yang J, Beyene J, Barrington K, Griogoriu A, Lodha A, O'Quinn C, McDonald S. Deferred cord clamping in twins: a retrospective cohort study. 7th Canadian National Perinatal Research Meeting. Banff, AB, Canada. February 2020
- Filion-Ouellet E, Shah P, Ye X, Lapointe A, **Beltempo M**. Cumulative effect of Prevention Intervention on outcomes of preterm infants <29 weeks of gestational age. 7th Canadian National Perinatal Research Meeting. Banff, AB, Canada. February 2020.

## Child Health and Human Development 2020

- Lee G, Poon AWH, Vadivel A, Khoja Z, Thebaud B, **Wintermark P**. Are the horizontal and amacrine cells of the retina injured in the context bronchopulmonary dysplasia (BPD) and can stem cell therapy repair these injuries? 2020 Child Health and Human Development (CHHD) Research Day, November 6th, 2020, Montreal, Canada. [Virtual Poster Presentation]
- Nunes GC, Wutthigat P**, Simoneau J, Renaud C, Dancea A, **Beltempo M, Altit G**. Chronic Pulmonary Hypertension in the Extreme Premature Newborns Not Exposed to Ductal Closure. Child Health and Human Development Research Day 2020, Montreal, QC, Canada. December 2020.

## IDWeek 2020

1. Cheng MP, Lawandi A, Butler-Laporte G, de L'Étoile-Morel S, **Paquette K**, Lee T. Adjunctive Daptomycin in the Treatment of Staphylococcus aureus Bacteremia. Podium Presentation, IDWeek, October 2020.

## Grand Challenges Annual Meeting 2020

1. Tann CJ, Nanyunja C, Sadoo S, Mambule I, Kawooya M, Duckworth E, Mathieson SR, Proietti J, Hagmann C, Webb EL, Nyirenda M, Gilbert G, Robertson NJ, Srinivasan L, Bainbridge A, Pergotti Baruteau K, Wintermark P, Boylan GB, Cowan FM, Nakimuli A. Birth asphyxia in African newborns (Baby BRAiNStudy): Developing a feasibility cohort In Uganda. Grand Challenges Annual Meeting 2020, October 19-21th, 2020, Seattle, USA. [Virtual Poster presentation]

## 2020 Health Brains for Healthy Lives Research Day

1. Ghafouri-Azar R, Yazdani A, Khoja Z, Tremblay S, **Wintermark P**. Sildenafil promotes recovery in the cerebellar white matter following term neonatal hypoxia-ischemia. 2020 Healthy Brains for Healthy Lives (HBHL) Research Day, August 17th, 2020, Montreal, Canada [Flash-talk Oral Presentation]

## 14<sup>th</sup> Annual Canadian Neuroscience Meeting 2020

1. Ducharme D, Kwan S, Gilbert G, Saint-Martin C, **Wintermark P**. Sildenafil as a neurorestorative treatment for neonatal hypoxic-ischemic encephalopathy: Preliminary assessment of efficacy using diffusion-tensor imaging. 14th Annual Canadian Neuroscience Meeting 2020, May 31st-June 3rd, 2020, Montreal, Canada. [Poster] Canceled because of COVID-19
2. Ghafouri-Azar R, Yazdani A, Khoja Z, Tremblay S, **Wintermark P**. Sildenafil promotes cerebellar white matter recovery following neonatal hypoxia-ischemia. 14th Annual Canadian Neuroscience Meeting 2020, May 31st-June 3rd, 2020, Montreal, Canada. [Poster] Canceled because of COVID19

## American Academic of Neurology 2020 Annual Meeting

1. Al Amrani F, Sebire G, Chen MF, **Wintermark P**, Saint-Martin C. Distinctive MRI pattern of perinatal brain injuries arising from placental inflammation and hypoxia-ischemia in term newborns. American Academy of Neurology 2020 Annual Meeting, April 27th,- May 1st, 2020, Toronto, Canada. [Poster presentation] Canceled because of COVID-19, but requested to present virtually on May 18th, 2020.
2. Al Amrani F, Racine E, Shevell M, **Wintermark P**. Death after birth asphyxia in the cooling era. American Academy of Neurology 2020 Annual Meeting, April 22–28th, 2017, Boston, USA. [Posterpresentation] Canceled because of COVID-19, but requested to present virtually on May 18th, 2020.

## 2020 QBIN Annual Scientific Day

1. Ducharme D, Kwan S, Gilbert G, Sain-Martin C, **Wintermark P**. Changes in fractional anisotropy in asphyxiated newborns following sildenafil administration. 2020 QBIN Annual Scientific Day, February 7th, 2020, Montreal, Canada. [Poster]

## National Athletic Trainer's Association Annual Meeting

1. Teel, E.F., **Brossard-Racine, M.**, Corbin-Berrigan, C.A., & Gagnon, I.J. (June 17<sup>th</sup>, 2020). Pediatric cognitive and balance performance at 4-Weeks post-concussion does not differ by 5P risk classification. National Athletic Trainer's Association Annual Meeting, Atlanta, GA, USA. [Accepted, but cancelled due to COVID-19 pandemic]

## Société Québécoise de Recherche en Psychologie

1. Caccese, C., Jones, S. L., Ramesh, M., Yu, A., **Brossard-Racine, M.**, Botteron, K. N., McCracken, J. T., & Nguyen, TV. (March 27th, 2020). Influence spécifique au sexe et à l'âge du ratio testostérone-cortisol sur le développement cortico-hippocampal. In M.-F. Marin (Chair), *Au-delà des différences sexuelles : le rôle des hormones sexuelles sur le cerveau, la cognition et les émotions*. Symposium conducted at the Société Québécoise de Recherche en Psychologie, Gatineau, QC, Canada. [Accepted, but cancelled due to COVID-19 pandemic]

## 50<sup>th</sup> Research and Development Congress of Tecnologico de Monterrey

1. Salas, M.\*, Near, J., Buckthought, A.\*, Guillaume, G., Easson, K.\*, Rohlicek, C., & **Brossard-Racine, M.** (February 28<sup>th</sup>, 2020). Brain metabolic profiles of youths born with congenital heart disease. 50<sup>th</sup> Research and Development Congress of Tecnologico de Monterrey, Monterrey, NL, Mexico.

## 9<sup>th</sup> Annual Scientific Sessions of Cardiac Neurodevelopment Outcome Collaborative

1. Bolduc, ME\*., Rennick, J., Gagnon, I., **Brossard-Racine, M.**, Majnemer, A., (November 18th, 2020). Developmental Follow-up Practices for Children with Congenital Heart Defects: A National Environmental Scan. 9<sup>th</sup> Annual Scientific Sessions of Cardiac Neurodevelopment Outcome Collaborative, Houston, Tx. Virtual conference due to COVID-19 pandemic.

## Organization for Human Brain Mapping Annual Meeting

1. Easson, K.\*, Gilbert, G., Houde, J.C., Buckthought, A.\*, Rohlicek, C., Saint-Martin, C., Descoteaux, M., Deoni, S., & **Brossard-Racine, M.** (June 24<sup>th</sup>, 2020). Myelination and executive function deficits in youth born with congenital heart disease. Organization for Human Brain Mapping Annual Meeting, Virtual conference due to COVID-19 pandemic.
2. Caccese, C., Jones, S. L., Ramesh, M., Yu, A., **Brossard-Racine, M.**, Botteron, K. N., McCracken, J. T., & Nguyen, TV. (June 23<sup>rd</sup>, 2020). Age- and sex-specific influence of testosterone-cortisol ratio on cortico-hippocampal development. Organization for Human Brain Mapping, Virtual conference due to COVID-19 pandemic.

## Society of Biological Psychiatry

1. Lew, J., Caccese, C., Jones, SL., Nguyen, TA., Rompotinos, D., Wu, M., Poirier, CS., LeGallais, J., Sylvain-Roy, S., Fayyazi, L., **Brossard-Racine, M.**, Karama, S., Herba, C., Parent, S., Da Costa, D., Zelkowitz, P., Fraser, W., Monnier, P., Trasler, J., Seguin, JR., & Nguyen, TV. (May 1<sup>st</sup>, 2020). Developmental risks of paternal age in the context of adrenarche. Society of Biological Psychiatry, New York, NY, USA. [Accepted, but conference cancelled due to COVID-19 pandemic- Poster will be published online].

## American Thoracic Society

1. **Wutthigat P, Beltempo M, Shalish W, Sant'Anna GM.** Postnatal steroids in extremely preterm infants: who, when and how much? E-Poster presentation at the *American Thoracic Society* virtual meeting (May 2021)

## 76<sup>th</sup> Annual Clinic and Scientific Conference for the Society of Obstetricians and Gynaecologists of Canada

1. Grabovac M, **Beltempo M**, Yang J, Beyene J, Barrington K, Griogoriu A, Lodha A, O'Quinn C, McDonald S. Deferred cord clamping in twins: a retrospective cohort study. 76th Annual Clinical & Scientific Conference of the Society of Obstetricians and Gynaecologists of Canada. Ottawa, ON, Canada. June 2020.