



## Research Department

### Annual Report 2013

Our Research Department was officially reorganized within a “research institute” in 2013, but our team remained essentially intact, cohesive, and productive throughout the year. In 2013, Catherine Cormier, Sonja Dey, Elke Ham, Grant Harris, Zoe Hilton, Carol Lang, and Shari McKee comprised its full-time, regular members. Marnie Rice (research director emerita) continued her research part-time. Terry Chaplin and Chelsea Lougheed were also part-time members of the team, and Fernanda Tichbourne did a Master’s student research practicum.

Highlights of 2013 were publication of the first article concerning the major knowledge translation project, led by Shari McKee, transforming the Georgianwood Concurrent Disorders Program to fully integrated treatment; and completion of the third edition of the best-selling and highly cited book, *Violent Offenders: Appraising and Managing Risk*.

#### **MISSION STATEMENT**

Our Research team’s mission is to:

- a) undertake and provide opportunities for research in the assessment, treatment, and prevention of mental disorder and violent crime;
- b) provide and evaluate specialized assessment and treatment services to inpatient and outpatient forensic and psychiatric clientele;
- c) offer opportunities for professional training and education in the areas of research, assessment and treatment of psychiatric patients and criminal offenders.

#### **The Work of the Research Department**

More than four decades of research falls into five overlapping topics:

**Appropriate Services for Offenders and Psychiatric Clients.** For many years, members of our Research team studied the problems faced by patients admitted both to forensic and nonforensic hospital divisions. Although individual problems are quite numerous and varied, our research showed these many problems can be grouped into a relatively small number of sets or factors. The benefit of doing so is that the services known to be effective are very consistent within such sets. Thus for example, psychosocial therapies known to be effective for depression are very similar (necessitating

the same clinician skills) to those effective for the severe anxiety that brings people to psychiatric hospital. Our research also showed that designing and implementing treatment is aided by taking advantage of similarities among clients in the patterns of problems they face, thus greatly simplifying service planning. We are engaged in a major knowledge translation effort implementing fully integrated treatment for concurrent disorders for nonforensic clients. More broadly however, for many problems clients face, there is a well-established body of evidence about efficacious services but this knowledge is not implemented. Thus, we bear the responsibility to advocate for evidence-based practice (examples at: <http://penetanguishene-research.com/appropriate-services-for-offenders-and-psychiatric-clients>).

**Violence Risk Appraisal.** How can scientific information about an individual's risk of violence be communicated to decision-makers so they make proficient decisions about managing that risk? Researchers from our team developed some of the most accurate and widely-validated systems for evaluating violence risk in offender and psychiatric populations, the *Violence Risk Appraisal Guide* (VRAG) and *Sex Offender Risk Appraisal Guide* (SORAG). We continue research to improve these tools and to show how users can improve decision-making with respect to clients' risk of violence.

**Domestic and Relationship Violence.** We conducted the Wife Assault Recidivism Risk Appraisal Project funded by the Social Sciences and Humanities Research Council of Canada. The project involved our Research team and colleagues with the Ontario Provincial Police. Two main results are the *Ontario Domestic Assault Risk Assessment* (ODARA) and *Domestic Violence Risk Appraisal Guide* (DVRAG). These tools comprise a coherent actuarial system that assesses how likely a man is to assault his partner again and how his risk compares with that of other wife assaulters. The tools predict the speed, frequency, and severity of domestic violence recidivism.

**Psychopathy.** Psychopaths are callous, manipulative, dishonest, and exhibit early behavior problems. Men with these traits are responsible for much crime and violence. What is the nature of psychopathy and what causes it? What could limit the harm caused by psychopaths? Researchers from our team showed that psychopathy is crucial to assessing violence risk, even among patients with schizophrenia. To meet the duty to protect public safety, forensic clinicians should fully assess psychopathy. Ongoing studies are aimed at the ultimate causes of psychopathy and its links with sexuality.

**Sexual Aggression.** Sex offenses against women and children are a major criminal justice concern. The Research Department established a phallometric laboratory and provided scientific evidence that sex offenders' offenses are partly caused by sexual attraction for relevant people and activities. Other studies explored technicalities of phallometric assessment and showed that sexual preferences predicted recidivism. Also, recent work examined rapists' sexual preferences and how those relate to antisociality in

general. Current studies examine pedophilia—sexual attraction to children. All this research leads away from attitudes, low self-esteem, and lack of insight as central explanations and treatment targets for sex offenders.

Our research focuses on the topics above. And, over the decades, the work has addressed four issues about each: the risks for the phenomenon, appropriate treatments and other interventions, translation of the scientific knowledge for clinicians and other users, and policy implications of the research findings. These paramount issues were subsequently adopted in the strategic plan of the research and academic division established in 2010 (reconfirmed in 2012) as the strategic directions of the division.

Over the decades, our team has conducted quantitative research; published in the peer-reviewed literature; acquired peer-reviewed grants and other external research funding; held academic appointments; partnered with university and government collaborators; hosted graduate student researchers; provided internal and external education, training, and technical support; hosted an internationally renowned scientific conference; designed, implemented, evaluated, and advocated for evidence-based practice at our facility; and supported the institution's research ethics board.

All the scientific and professional work of our Research team can inform practice in the assessment and treatment of psychiatric clients, offenders, and persons at risk at this hospital, and in Canada generally. For more information, please see <http://penetanguishene-research.com>.

## **Activities in 2013**

During 2013, members of our Research team applied for a major research grant and maintained their record of scientific and academic publication. In 2013, work by members of our Research team was cited a record 477 times in scientific and professional journals. Research grants, publications, and citations are our three principal performance indicators and our Research team maintained achievement in each.

This report summarizes the achievements of our Research team for 2013 by focusing on six key functions.

### **1. To produce knowledge relevant to the etiology, assessment, treatment, or prevention of mental disorders**

#### **a) *Research grants***

Nunes, K., Cantor, J., Gress, C., Harris, G.T., Lalumière, M.L., Rice,

M.E., & Seto, M.C. (2013, September). *Enhancing the assessment and diagnosis of pedophilic disorder: Validation of innovative measures of sexual interest in children*. Submitted to the Canadian Institutes of Health Research.

In addition, an external researcher approached our Research team with an interest in conducting externally-funded scientific research on the effects of intense exercise on the symptoms of metabolic syndrome and mood disorders among inpatients. We assisted by attempting to initiate preliminary discussions with hospital clinicians, especially recreationists.

### **b) Ongoing projects**

In addition to the work represented by the research grants above, the following are some scientific studies currently undertaken by members of our Research team.

Harris, G.T., Hilton, N.Z., & Bruer, R. (planning). *Mental Illness and Homelessness*.

Harris, G.T., Rice, M.E., & Chaplin, T.C. (in preparation). *Discriminant Validity of Phallometric Testing Using Morphed Stimuli and Stimuli Describing Extreme Violence*.

Harris, G.T., & Rice, M.E., Harris, M.A. (in progress). *Psychopathy as a Viable Life History Strategy: Studies of Early Childhood, Sexuality, Paternity, Longevity and Causes of Mortality among Mentally Disordered Offenders*.

Hilton, N. Z. & Ball, L. (in preparation). *Voices of Mothers with Mental Illness: Concerns of Mothers in the Mental Health System*.

Hilton, N.Z., Eke, A.W. Harris, G.T., & Rice, M.E. (in progress). *Domestic Offenders' Career Trajectories and The Ontario Domestic Assault Risk Assessment*.

Hilton, N.Z., & Ham, E. (in progress). *Evaluation of Risk Assessment Training by Live Presentation, Directed Study, and On-line Training Methods*.

Hilton, N. Z., Ham, E., Nunes, K. L., & Frank, C. (in preparation). *Graphs Improve Use of Actuarial Violence Risk in Forensic Decision Making*.

Hilton, N.Z., Popham, S., & Harris, G.T. (in progress). *Domestic Violence Risk and Treatment in Correctional Samples*.

Hilton, N.Z. et al. (in progress). *Neurodevelopmental Damage, Psychopathy, and Institutional Presentation: A 10-Year Study of Forensic Patient Outcomes*.

Lalumière, M. L., Seto, M.C., & Harris, G. T. (in preparation). *Relative*

*Indifference to Sexual Cues: An Explanation of Paraphilia.*

McKee, S.A., Harris, G.T., Cormier, C.A., & Brown, C. (in preparation). *A Follow-up of Clients Receiving Integrated Residential Treatment for Co-occurring Disorders.*

Rice, M.E., & Harris, G.T. (in progress). *Long-term Follow-up of Violent Offenders: Characterizing Criminal Careers.*

Rice, M.E., & Harris, G.T. (in progress). *Long-term Follow-up of Sex Offenders: The predictive accuracy of the SORAG and the VRAG-R.*

Rice, M.E., Harris, G.T., & Chaplin, T.C. (in progress). *Fundamental Bases of Pedophilia: Paradoxical Sexual Responding and the Effect of WHR.*

## **2. To communicate the knowledge to relevant consumers**

### **a) Informal communication**

Throughout 2013, our Research team maintained its commitment to communicating our research activities and results externally (to colleagues, collaborators, professionals, and the media), and internally. Thus, we maintain sites on the Internet (<http://penetanguishene-research.com>) and on PenNIE, the institution's intranet site. We provide electronic versions of most publications to anyone who asks for them.

### **b) Extramural presentations**

Members of our Research team gave several formal presentations in 2013. Among them were:

Harris, G.T. (2013, June). *Psychopathy as life history strategy.* Forensic and Clinical Applications of the Hare Psychopathy Checklist-Revised: PCL-R training and a special event celebrating 30 years of psychopathy research in Penetanguishene. Midland, ON.

Harris, G.T. (2013, October). *Appraising recidivism risk of sex offenders: The SORAG and VRAG-R. Part II.* Paper presented at the 32nd Annual Conference of the Association for the Treatment of Sexual Abusers. Chicago, IL.

Hilton, N. Z., Moderator. (2013, June). *Controversies in violence risk communication: Emerging findings and future directions.* Canadian Psychological Association, Quebec City, PQ. Individual paper presenters: Helmus, L., Hilton, N.Z., & Scurich, N. (2013).

Hilton, N. Z. & Nunes, K. L. (2013, June). *Effective Violence Risk Communication: What is it and How Can it Be Achieved?* Canadian Psychological Association, Quebec City, PQ.

Hilton, N. Z. (2013, October). *Risk assessment as a tool for communication, cooperation, and prevention*. Muriel McQueen Fergusson Centre, University of New Brunswick, Fredericton, NB.

Hilton, N. Z. (2013, November). *Ten-year study of forensic patient progress*. Research & Academics Colloquium, Penetanguishene, ON.

McKee, S.A., & Brown, C. (2013, May). *Knowledge translation from research to the front lines: Implementation and evaluation of an integrated treatment program for concurrent disorders*. Paper presented at the first annual Addictions & Mental Health Ontario conference. Toronto, Canada.

Rice, M.E. (2013, June). *Life-course persistent antisociality and violence risk*. Forensic and Clinical Applications of the Hare Psychopathy Checklist-Revised: PCL-R training and a special event celebrating 30 years of psychopathy research in Penetanguishene. Midland, ON.

Rice, M.E., & Harris, G.T. (2013, June). *Validation of and revision to the VRAG and SORAG: The Violence Risk Appraisal Guide—Revised (VRAG-R)*. Annual Convention of the Canadian Psychological Association. Quebec City, PQ.

Rice, M.E. (2013, September). *Improving public safety without increasing criminal sanctions: Actuarial assessments of risk for violence*. Canadian Association of Provincial Court Judges Conference, St. Johns, Newfoundland.

Rice, M.E. (2013, October). *Appraising recidivism risk of sex offenders: The SORAG and VRAG-R. Part I*. Paper presented at the 32nd Annual Conference of the Association for the Treatment of Sexual Abusers. Chicago, IL.

### **c) Publications**

The following scholarly works with at least one member of our Research team as an author were published or in press in 2013.

Harris, G.T., Rice, M.E., Quinsey, V.L., & Cormier, C.A. (in press). *Violent offenders: Appraising and managing risk* (Third Edition). American Psychological Association.

Hilton, N.Z., Harris, G.T., & Rice, M.E. (in press). The step-father effect in child abuse: Comparing discriminative parental solicitude and antisociality. *Psychology of Violence*.

Hilton, N.Z., Popham, S., Lang, C., & Harris, G.T. (in press). Preliminary validation of the ODARA for female intimate partner violence offenders. *Partner Abuse*.

Rice, M.E., & Harris, G.T. (in press). What does it mean when age is related to recidivism among sex offenders? *Law and Human Behavior*.

Rice, M.E., & Harris, G.T. (in press). The Sex Offender Risk Appraisal Guide. In H. Hoberman & A. Phenix (Eds.). *Sexual offenders: Diagnosis, risk assessment and management*. Hoboken, NJ: John Wiley & Sons.

Folkes, S., Hilton, N.Z., & Harris, G.T. (2013). Weapon use increases the severity of domestic violence but neither weapon use nor firearm access increase the risk or severity of recidivism. *Journal of Interpersonal Violence*, 28, 1143-1156.

Harris, G.T. & Rice, M.E. (2013). Bayes and base rates: What is an informative prior for actuarial risk assessment? *Behavioral Sciences and the Law*, 31, 103-124.

Harris, G.T., Rice, M.E., & Cormier, C.A. (2013). Research and clinical scoring of the Psychopathy Checklist can show good agreement. *Criminal Justice and Behavior*, 40, 1349-1362.

Hilton, N.Z., Harris, G.T., & Rice, M.E. (2013). The actuarial assessment of risk for domestic violence recidivism. In F.W. Winkel & A.C. Baldry (Eds.). *Domestic assault risk assessment: Predictive validity at the interface of forensic and victimological psychology* (pp. 127-144). Nijmegen: Wolf Legal Publishers.

Krupp, D.B., Sewall, L.A., Lalumière, M.L., Sheriff, C., & Harris, G.T. (2013). Psychopathy, adaptation, and disorder. *Frontiers in Evolutionary Psychology*, 4, 139. doi: 10.3389/fpsyg.2013.00139.

McKee, S.A., Harris, G.T., & Cormier, C.A. (2013). Implementing residential integrated treatment for co-occurring disorders. *Journal of Dual Diagnosis*, 9, 249-259.

Rice, M.E., & Harris, G.T. (2013). Treatment for adult sex offenders: May we reject the null hypothesis? In K. Harrison & B. Rainey (Eds.) *The Wiley-Blackwell handbook of legal and ethical aspects of sex offender treatment and management* (pp. 219-235). New York: Wiley-Blackwell.

Rice, M.E., & Harris, G.T. (2013). Psychopathy and violent recidivism. In K.A. Kiehl & W. Sinnott-Armstrong (Eds.) *Handbook on psychopathy and law*. New York: Oxford University Press.

Rice, M.E., Harris, G.T., & Lang, C. (2013). Validation of and revision to the VRAG and SORAG: The Violence Risk Appraisal Guide—Revised (VRAG-R). *Psychological Assessment, 25*, 951-965.

#### **d) Citations**

A January 3, 2014 check of the Science Citation Index showed that our work was cited in the psychological, social science, medical, and legal journal literature 477 times in 2013, the largest annual total ever recorded. This figure includes citations of scholarly works in which the Research Department is the affiliation an author but excludes self-citations (a citation by one member of the Department of him or herself or another member). We undertake only a formal search for the senior author in published journal articles, and thus we know our figures are underestimates.

We also compared the measurement of citations by the Science Citation Index with that provided by Google Scholar. By the latter method, more than 800 citations were recorded in 2013. Google Scholar captures more of the literature in technical reports, dissertations, books and book chapters, and non-English language outlets. Both methods yielded the same general conclusion—work by members of our Research team has very high impact, greater than any other similar research group in the world.

By far, research on our various violence risk assessments produces the most citations. A much smaller proportion of the citations results from our many studies of the clinical characteristics and recommended services for the hospital's clientele and policy-oriented research.

#### **e) Requests for information**

Based on data kept for the first week of each month, we estimate that we responded to 1542 requests for research related advice or information in 2013; 380 were from inside the institution and 1162 from outside. A number of the outside requests were from representatives of the news media.

By far, the most frequent topic of external requests for information is our work on the assessment of domestic violence risk that resulted in the *Ontario Domestic Assault Risk Assessment (ODARA)* and the *Domestic Violence Risk Appraisal Guide (DVRAG)*, most fully described in the recent book, Hilton, N.Z., Harris, G.T., & Rice, M.E. (2010). *Risk assessment for domestically violent men: Tools for criminal justice, offender intervention, and victim services*. Washington, DC: American Psychological Association.

### **3. To help others conduct substantive and evaluative research through the provision of technical advice**

#### **a) *Reviews of journal and grant submissions***

Research team members provided reviews of 56 manuscripts submitted for publication and three research grant proposals. The total comprised a rate of more than one review per week (each requiring approximately a person-day).

#### **b) *Participation on journal editorial boards and research grant review committees***

Grant Harris served on the editorial boards of *Archives of Sexual Behavior*, *Law and Human Behavior*, *Sexual Abuse: A Journal of Research and Treatment*, and the *Canadian Journal of Criminology and Criminal Justice*. Zoe Hilton served on the editorial board of the *Journal of Interpersonal Violence*. Marnie Rice served on the editorial boards of *Criminal Justice and Behavior*; the *Journal of Interpersonal Violence*; *Psychological Trauma: Theory, Research, Practice, and Policy*; *Sexual Abuse: A Journal of Research and Treatment*; and the *Open Access Journal of Forensic Psychology*.

Marnie Rice served on the Research Committee of the Association for the Treatment of Sexual Abusers.

### **4. To provide assessment and treatment for selected groups of forensic and psychiatric patients**

The *Sexual Behaviour Laboratory* assessment program run by Terry Chaplin had 35 referrals during 2013 and 22 phallometric assessments were completed. Most of the remainder were interviewed and reports were written.

Catherine Cormier, Grant Harris, Zoe Hilton, and Marnie Rice provided consultation about risk appraisals and risk assessment research to professionals all over the world.

Shari McKee led several weekly cognitive-behavior therapy groups for clients on the Georgianwood Concurrent Disorders Program. She also provided individual assessments and individual cognitive-behavior therapy sessions.

### **5. To assist in the education and training of institutional staff and professional groups**

Grant Harris continued to hold adjunct faculty appointments in the Department of Psychology at Queen's University and the Department of Psychiatry at the University of Toronto. Zoe Hilton continued to hold a status appointment in the Department of Psychiatry at the University of Toronto. Marnie Rice continued to hold a part-time appointment as in the Department of Psychiatry and Behavioural Neuroscience at McMaster University, and adjunct appointments in the Department of Psychiatry at the University of Toronto and the Department of Psychology at Queen's University. She is also a Fellow of the Royal Society of Canada. Fellowship in the Royal Society is the highest academic accolade available to scientists and scholars in Canada.

In addition to all of the formal presentations, consultation, and treatment described here, members of our Research team provided several other formal educational and training events in 2013; among them were:

Ham, E., Lang, C., & Hilton, Z. (2013, March). *2011 Oak Ridge admissions and new developments: Third presentation of the 10-year study*. Forensic Assessment Program, Penetanguishene, ON.

Harris, G.T. (2013, February). *Injury to mental hospital workers: Understanding and prevention*. Ryerson University. Toronto, Canada.

Hilton, N.Z. (2013, October). *ODARA trainer training and policy development for the national government of New Zealand*. Wellington, NZ.

Hilton, Z., & Lougheed, C. (2013, June). *Ten-year study: Therapeutic activities definitions and participation*. Forensic Assessment Program, Penetanguishene, ON.

Lang, C., & Ham, E. (2013, January). *Internship and Job Fair*. Research Analyst Program, Georgian College. Barrie, ON.

Zoe Hilton developed and led two sessions of an *Evidence Essentials* course for hospital staff, along with other members of the research and academic division. She also provided three talks to local grade 11 psychology and grade 12 law classes.

Especially noteworthy here is the large project undertaken to develop an electronic, online learning package for practitioners to learn to score and interpret the *Ontario Domestic Assault Risk Assessment (ODARA 101)*. This high-tech implementation of knowledge translation and integration was supported by a grant from the Ministry of Community Safety and Correctional Services. This intensive work was led by Elke Ham and Zoe Hilton and resulted in a cutting edge package finally implemented on the Internet in 2013 (<http://odara.waypointcentre.ca>). During 2013, 502 new ODARA users (92% of whom took ODARA 101) were certified.

Shari McKee led the efforts to incorporate dialectical behavior therapy (DBT) on the Georgianwood program. This has entailed participating in the online training, writing treatment manuals, facilitating a weekly DBT consultation group for program clinicians, and providing clinical supervision.

Terry Chaplin and Catherine Cormier provided ongoing consultation on sex offenders and actuarial violence risk assessment for institutional staff members as well as other psychiatric hospitals, provincial correctional facilities, probation officers of the Ministry of Community Safety and Correctional Services, the Correctional Service of Canada, the Ontario Provincial Police, the Simcoe County Association for Community Living, the Children's Aid Society, and several crown attorneys and private practitioners.

Terry Chaplin gave informal presentations to several tour groups. He assisted in the ongoing clinical monitoring and support for clients living in the community, and provided clinical consultation at recovery meetings with parents, clinicians, or probation supervisors.

Catherine Cormier provided monthly educational sessions for staff members as part of the *Foundations Two Program*, the staff orientation program now called *Clinical Orientation*.

Shari McKee provided supervision for a psychology staff member preparing for college registration, and she provided clinical supervision in cognitive behavioral therapy and behavior therapy for Georgianwood clinicians.

## **6. To assist the hospital's management and other agencies in planning patient assessment and treatment programs, and in revising and reviewing policies and procedures.**

Grant Harris offered consultation to the task force charged with leading the reduction in the use of seclusion and restraint across the hospital. He led two sub-committees (literature and long-term oversight) and was a member of a third. In collaboration with other psychology professionals, he assisted with the implementation of the recovery philosophy by drafting a proposal for the systematic ongoing measurement of the hospital's therapeutic environment. This study would have permitted a controlled evaluation of the effects on inpatients of the move to the new building. He also provided clinical and research consultation to the dysphagia working group. And he served as a fire warden.

Zoe Hilton provided research and clinical consultation for at least five hospital staff groups. She served on the sustainability advisory committee, quality of medical care audit committee, and sexual health task force.

Zoe Hilton and Shari McKee served on the hospital's research ethics board.

Shari McKee assisted with efforts to implement and evaluate dialectical behavior therapy across the hospital by assisting with consultation and providing clinical supervision. She co-led a hospital-wide DBT implementation and support group for interested clinicians. She also served on the advisory board for the bachelor of behavioural psychology program of St. Lawrence College.

Finally, members of our Research team continued to advocate for efficacious and ethical services for the hospital's clientele (e.g., see <http://penetanguishene-research.com/appropriate-services-for-offenders-and-psychiatric-clients>).