



# A Canada-Wide Survey of Workplace Psychosocial Conditions

CARWH 2016: Advancing Research to Improve Work and Health
October 18, 2016
Toronto





### Context:



- Labour sponsored occupational health clinic funded by provincial government compensation agency (prevention branch)
- Board of Directors are labour union members accountable to Ministry of Labour for governance and budgets
- 7 clinics throughout the province worker H&S and Compensation representatives are the major stakeholders
- At a stakeholder meeting in 2009 working group established, workplace stress risk assessment tools were recognized as a need
- Mental Injury Tool (MIT) group formed in response
- MIT group reviewed various tools and selected short COPSOQ





## Theoretical Framework:



- The Copenhagen Psychosocial Questionnaire (COPSOQ) was first developed in Denmark 1997
- The intent was to create an instrument that measured psychosocial risk factors by covering the important dimensions of the seven theories of workplace stress:
  - 1. The job characteristics model (JCM)
  - 2. The Michigan organization stress (MOS) model
  - 3. The job demands—control model (DC)
  - 4. The sociotechnical (ST) approach
  - 5. The action-theoretical (AT) approach
  - 6. The effort-reward imbalance (ERI) model
  - 7. The vitamin model (VM)
  - 8. also absorbed other models such as Organizational Justice, over the yrs
  - 9. recently demonstrated that elements are also consistent with the Job Demands Resources (JD-R) model



## MIT Survey Content:

- Short COPSOQ II 28 questions of 14 risk factors, 4 offensive behaviours, work-life imbalance, job satisfaction
- Symptoms from long COPSOQ II 20 symptom questions of 5 symptoms and self-rated general health
- 2 additional offensive behaviours discrimination & vicarious offensive behaviours
- 9 H&S conditions questions (concerned, annoyed, interference)
- Demographics, job conditions (precarity, education, shift, hrs)
- Opinions of working conditions (job security, sufficient resources, accident investigation attitudes, tolerance of offensive behaviours)
- Global rating of psychological H&S climate & culture

#### Demands

- Quantitative demands—not having enough time
- Work pace—having to work at a high pace
- Emotional demands—work that involves emotional investment

#### **Work Organization**

- Influence—having influence over your work
- Possibilities of development able to learn new things, take initiative
- Meaning of work—feeling that your work is important and meaningful

 Commitment—feeling that your workplace makes a positive contribution

#### Relationship

- Predictability—being kept well informed, having enough information
- Recognition being appreciated and treated fairly
- Role clarity—knowing what is expected and having clear objectives
- Leadership—supervisor has planning skills, values your job satisfaction
- Supervisor support—your supervisor listens and helps

#### **Work Values**

- Trust—information from management is trustworthy; management trusts workers
- Justice and respect—conflicts resolved fairly, work distributed fairly

#### Work/Life Balance

- job satisfaction
- · Work/life conflict

#### Offensive Behaviours

 Undesired sexual attention, threats of violence, physical violence, bullying

Kristensen, T. S. et al. 2005. Scandinavian Journal of Work and Environmental Health 31(6), 438-49.









### Methods:

- In conjunction with a recognized Canadian polling organization (EKOS), an online survey was completed between February and March 2016.
- Selection criteria were any employed Canadian working in a workplace with more than 5 employees.
- Survey was made available in English & French
- Originally the sample began with just Ontario but was later expanded to all of Canada
- EKOS provided weighting factors to adjust to the Census



# Population Sample:



- A total of 4,113 participants completed the survey online.
- This included 1,584 workers in Ontario and 2,529 workers in other provinces in Canada.
- All cases completed were pre-recruited panel members among those willing to complete interviews online.
- 2,887 of the cases were from the EKOS Probit Panel.
- In order to augment the number of cases collected with respondents under 35 years of age, another 1,226 were collected from panel members of the Legerweb Panel among the portion of panel assembled using a random digit dial (RDD) selection process.
- 316 of the Ontario cases were collected using the LegerPanel (1,268 using the EKOS Probit Panel); 910 of the cases collected in the rest of Canada were collected using the LegerPanel, (1,619 using the EKOS Probit Panel).
- The data set is weighted according to the most recent Labour Force Survey data (February 2016) from Statistics Canada on age, gender and region.

acanomic costor	weighted	StatsCan	ratio EKOS
economic sector	frequency	frequency	to StatsCan
Agriculture, Forestry, Fishing, Hunting	1.8%	3.6%	1.0
Mining	1.8%	5.0%	1.0
Utilities	4.8%	0.8%	6.3
Construction	4.1%	7.6%	0.5
Manufacturing	7.9%	9.5%	0.8
Wholesale Trade	1.4%	15.2%	0.7
Retail Trade	9.4%	15.270	0.7
Transportation and Warehousing	4.4%	5.1%	0.9
Finance and Insurance, Real Estate Rental and Leasing	5.3%	6.1%	0.9
Administrative and Support and Waste Mgmt & Remed Services	1.7%	4.2%	0.4
Educational Services	14.7%	7.1%	2.1
Health Care and Social Assistance	13.4%	12.8%	1.0
Information, Information Technology	6.6%	4.2%	2.3
Arts, Entertainment and Recreation	3.0%	4.270	2.5
Accommodation and Food Services	3.9%	6.7%	0.6
Public Administration	11.6%	5.1%	2.3
Professional, Scientific and Technical Services	8.8%	7.6%	1.2
Other Services (Not including Public Administration)	4.6%	4.2%	1.1



## Results:

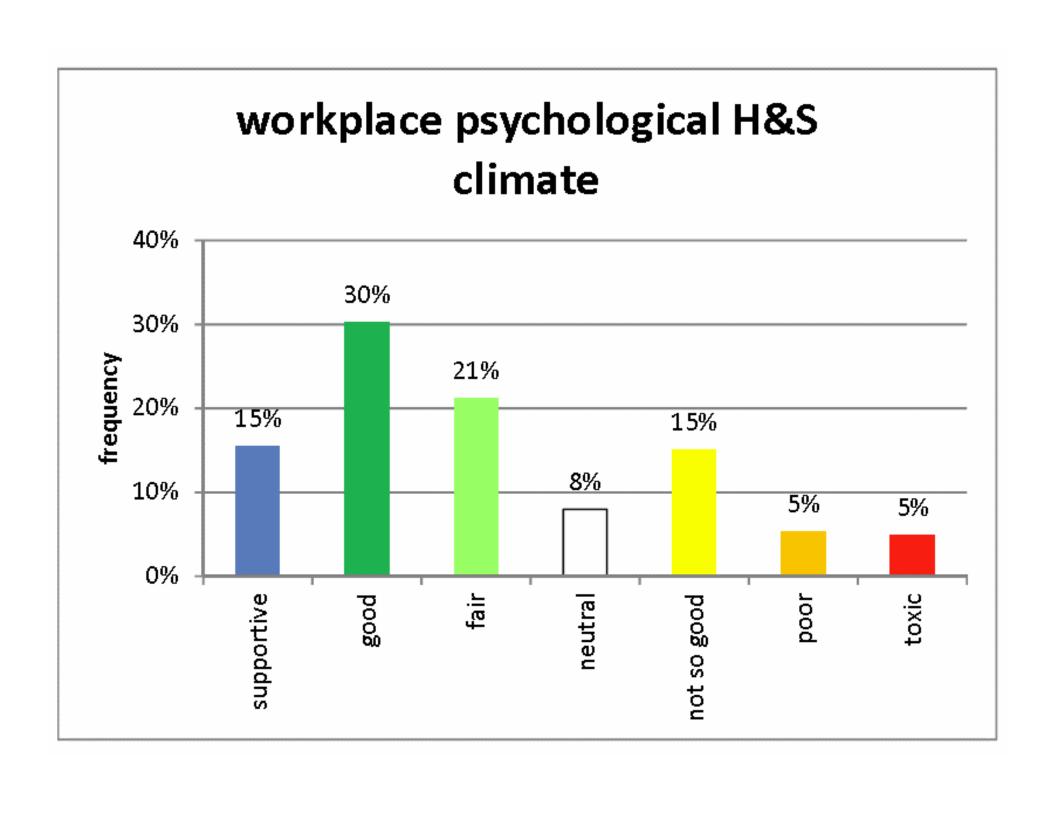


# Psychological H&S climate

How would you rate the **psychological health & safety climate** in your workplace?

] <sub>1</sub> healthy/supportive
] <sub>2</sub> good
] <sub>3</sub> fair
] <sub>4</sub> neutral
] <sub>5</sub> not so good
] <sub>6</sub> poor
l <sub>z</sub> toxic





# Colour scheme:

- Scores for each scale were divided by economic sector
- For each scale the Excel default gradient colouring was used which assigns green to sector with the best score and red to the sector with the worst score and the median being yellow
- Each scale was "coloured" independently of the other scales



economic sector	job (employment) security is good
Agriculture, Forestry, Fishing, Hunting	
Mining	
Utilities	
Construction	
Manufacturing	
Wholesale Trade	
Transportation and Warehousing	
Information, Information Technology	
Finance and Insurance, Real Estate Rental and Leasing	
Administrative Support & Waste Mgmt/Remed Services	
Educational Services	
Health Care and Social Assistance	
Arts, Entertainment and Recreation	
Accommodation and Food Services	
Public Administration	
Retail Trade	
Professional, Scientific and Technical Services	
Other Services (Not including Public Administration)	

economic sector	job (employment) security is good	employment insecurity	job instability
Agriculture, Forestry, Fishing, Hunting	24	32	-
Mining	10		
Utilities	22	31	-
Construction	24	33	•
Manufacturing	24	3.8	-
Wholesale Trade	21	37	œ.
Transportation and Warehousing	24	38	œ.
Information, Information Technology	27	42	
Finance and Insurance, Real Estate Rental and Leasing	22	33	-
Administrative Support & Waste Mgmt/Remed Services	24	o	**
Educational Services	21	24	-
Health Care and Social Assistance	22	27	-
Arts, Entertainment and Recreation	23	a	•
Accommodation and Food Services	27		-
Public Administration		28	-
Retail Trade	24	37	•
Professional, Scientific and Technical Services	24	33	•
Other Services (Not including Public Administration)	23	34	

precarity score	workplace has	enough resources	staffing levels	adequate
62	23		27	
	23		20	
	24		28	
71	21		28	
73	28		28	
	24		27	
**	24		97	
	24		20	
44	22		27	
76	23		28	
	27		28	
67	27		31	
74	27		36	,
73	31		3.6	,
6.7	24		20	
	24		28	
63	23		28	
47	24		28	

#### Demands

- Quantitative demands—not having enough time
- Work pace—having to work at a high pace
- Emotional demands—work that involves emotional investment

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#### Work/Life Balance

- job satisfaction
- Work/life conflict

#### Offensive Behaviours

 Undesired sexual attention, threats of violence, physical violence, bullying

Kristensen, T. S. et al. 2005. Scandinavian Journal of Work and Environmental Health 31(6), 438-49.





economic sector	quantitative demands	work pace	emotional demands	work demands sum	work life conflict
Agriculture, Forestry, Fishing, Hunting	31		21	100	2.8
Mining	31	50	24	120	29
Utilities	21	"	24	100	22
Construction	11		**	114	31
Manufacturing	11	67	**	100	27
Wholesale Trade	11		**	124	20
Transportation and Warehousing	24	"	24	1 04	10
Information, Information Technology	31	62	33	120	32
Finance and Insurance, Real Estate Rental and Leasing	34	u	32	112	24
Administrative Support & Waste Mgmt/Remed Services	23	a	24		24
Educational Services	31	a	41	124	24
Health Care and Social Assistance	32	47	"	124	27
Arts, Entertainment and Recreation	32		37	117	27
Accommodation and Food Services	21	ω	**	124	20
Public Administration	31	a	**	***	28
Retail Trade	33	8.2	24	***	29
Professional, Scientific and Technical Services	31	u	33	***	28
Other Services (Not including Public Administration)	21	· ·	α	***	27

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economic sector	influence	possibilities for development	meaning of work	commitment to the workplace
Agriculture, Forestry, Fishing, Hunting	α	n	**	a
Mining	44	87		
Utilities	38	49	60	47
Construction	47			
Manufacturing	37	10	80	47
Wholesale Trade	α		u	a
Transportation and Warehousing	11	u	a a	11
Information, Information Technology	12	14		er.
Finance and Insurance, Real Estate Rental and Leasing	40	64	63	0
Administrative Support & Waste Mgmt/Remed Services	34	50	80	4
<b>Educational Services</b>	34	67	62	
Health Care and Social Assistance	33	63	·	
Arts, Entertainment and Recreation	40	17		a
Accommodation and Food Services	u			o
Public Administration	31	12		a
Retail Trade	31		a a	a
Professional, Scientific and Technical Services	α			0
Other Services (Not including Public Administration)	11	10	40	o

work organization		sum
	***	
	2 06	
	174	
	211	
	181	
	183	
	184	
	194	
	104	
	177	
	2 00	
	182	
	193	
	184	
	182	
	2 06	
	174	

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economic sector	predictability	rewards/ recognition	role clarity	quality of leadership	social support from supervisor
Agriculture, Forestry, Fishing, Hunting	41	11	87	42	
Mining	"	n	67	"	ω
Utilities	40	а		41	63
Construction					
Manufacturing	4.0	4	**	40	
Wholesale Trade	44	47		42	
Transportation and Warehousing	11	11	82	14	"
Information, Information Technology	"	a			
Finance and Insurance, Real Estate Rental and Leasing	"	n			
Administrative Support & Waste Mgmt/Remed Services	**	47		"	**
<b>Educational Services</b>	41	а	**	41	
Health Care and Social Assistance	44	α	**	11	
Arts, Entertainment and Recreation	"	и	**	47	
Accommodation and Food Services			:		ο
Public Administration		a			62
Retail Trade	4	n			
Professional, Scientific and Technical Services					
Other Services (Not including Public Administration)	40	4	83	40	

relationship sum

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economic sector	trust of mgmt	justice & respect
Agriculture, Forestry, Fishing, Hunting	14	u
Mining	12	a
Utilities		a
Construction	67	43
Manufacturing	49	44
Wholesale Trade	12	44
Transportation and Warehousing	a	33
Information, Information Technology	ia.	o
Finance and Insurance, Real Estate Rental and Leasing	14	4.0
Administrative Support & Waste Mgmt/Remed Services		40
Educational Services	н	п
Health Care and Social Assistance	и	n
Arts, Entertainment and Recreation	67	5.0
Accommodation and Food Services	44	**
Public Administration	и	0
Retail Trade	67	6.0
Professional, Scientific and Technical Services	14	n e
Other Services (Not including Public Administration)	4.0	43

social support from colleagues	social support from supervisor	good colleague atmosphere	
21		21	
22	o	34	
21	63	30	
38		34	
21		30	
27	44	31	
26	44	24	
10		33	
27	**	**	
33	40	34	
21		20	
21	u	21	
31		32	
32	63	24	
21	62	30	
31		24	
30	**	33	
26			

jobs atisfaction

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economic sector	undesired sexual attention	threats of violence	physical violence	bullying	discrimination	vicarious offensive behviours
Agriculture, Forestry, Fishing, Hunting	8%	8%	6%	21%	22%	27%
Mining	12%	17%	11%	46%	21%	47%
Utilities	9%	14%	9%	25%	14%	40%
Construction	10%	12%	6%	27%	20%	35%
Manufacturing	7%	11%	6%	29%	21%	40%
Wholesale Trade	15%	14%	13%	32%	21%	47%
Transportation and Warehousing	11%	20%	7%	31%	20%	42%
Information, Information Technology	16%	14%	8%	27%	20%	32%
Finance and Insurance, Real Estate Rental and Leasing	9%	6%	4%	21%	14%	26%
Administrative Support & Waste Mgmt/Remed Services	19%	26%	11%	30%	16%	32%
Educational Services	8%	17%	15%	33%	20%	47%
Health Care and Social Assistance	16%	28%	22%	36%	20%	49%
Arts, Entertainment and Recreation	15%	15%	6%	29%	16%	48%
Accommodation and Food Services	20%	10%	4%	35%	20%	45%
Public Administration	12%	18%	11%	35%	24%	42%
Retail Trade	21%	16%	9%	31%	19%	40%
Professional, Scientific and Technical Services	8%	6%	2%	26%	12%	33%
Other Services (Not including Public Administration)	12%	15%	5%	32%	16%	42%
Denmark	2.9%	7.8%	3.9%	8.3%		

effectiveness

V&H policy

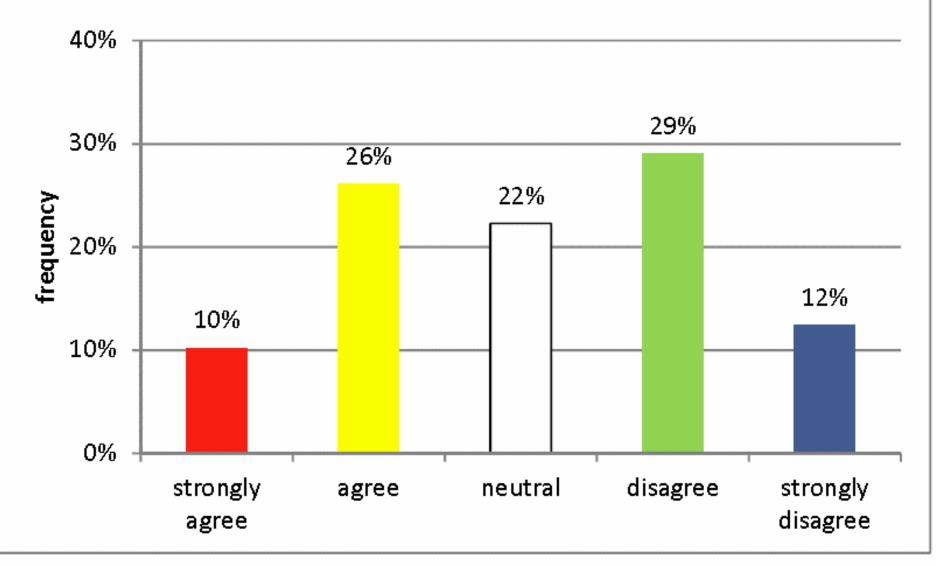
## Tolerance of harmful behaviour

To what extent would you agree that the culture of this organization tolerates behaviour that harms the mental health of those who work here?

<sub>1</sub> strongly agree
<sub>2</sub> agree
<sub>3</sub> neutral
4 disagree
strongly disagree







## Conclusions:

- This survey gives a unique cross-sectional picture of the state of psychosocial work conditions among Canadian workers that is currently not available from any other sources in Canada.
- The data allows one to target economic sectors for sector-specific interventions addressing high frequency risk factors
- Offensive behaviours are particularly prevalent in Canadian workplaces when compared to the Danish reference population



## Further work ...

- Evaluating the validity and reliability of English and French versions of the survey (test – re-test on sub-set, confirmatory factor analysis - IWH)
- Produce Canadian reference data (English/French?) for use of COPSOQ survey in Canadian workplaces
- Examine the relationship between the psychosocial work environment and health outcomes
- Collaborate with International COPSOQ Network to publish world-wide COPSOQ III experience (2018?)
- Working with Sandra Moll (School of Rehabilitation, McMaster University) and her students to do a qualitative analysis of the survey comments

