

# PRIVATE SEWAGE VARIANCE TRANSITION

AOWMA 2020 Conference

# Variance Transition Working Group

- ▶ Terms of Reference established April 2018

- ▶ Mandate:

To engage municipalities, Safety Codes Officers and the Government of Alberta in the transition of the variance process as required by the Safety Codes Act. The Variance Transition Working Group will specifically work with the respect to separation distances related to the Private Sewage Discipline. The intent of the group is to understand the applicable legislation, work through pertinent areas for improvement and communicate key information out to municipalities.

# Variance Transition Working Group

## ▶ Working Group Matrix:

- ▶ RMA Board of Directors co-chair: Kathy Rooyackers
- ▶ Alberta Municipal Affairs co-chair: Dean Morin
- ▶ Alberta Municipal Affairs Community and Technical Support: Joe Petryk
- ▶ Alberta Health Services: Shane Hussey
- ▶ Two rural municipalities: Cynthia Vizzutti (MD Willow Creek) and Dave Gervais (MD of Smoky River)
- ▶ Summer Village rep: Pete Langelle (Alberta Summer Village Association)
- ▶ Municipal Safety Codes Officer: Steve Neff (Leduc County)
- ▶ Agency Safety Codes rep: Nicole Paggett (Park Enterprises Ltd.)
- ▶ RMA administrative rep: Wyatt Skovron and Tasha Blumenthal

## ▶ Quarterly meetings:

- ▶ May 24, Aug 15, Oct 19 and Dec 7 (2018)
- ▶ Feb 20, May 23 and Sept 4 (2019)



# WHY DOES ANY OF IT MATTER?

- ▶ MUNICIPALITIES OVERSEE AND GOVERN DEVELOPMENT AND THE USE OF LANDS WITHIN THEIR MUNICIPAL BOUNDARIES.
- ▶ MUNICIPALITIES NEED TO BE AWARE OF PRIVATE SEWAGE ONSITE MANAGEMENT IN THEIR DEVELOPMENT RESPONSIBILITY
- ▶ FUTURE DEVELOPMENT CAN BE IMPACTED BY ONSITE SYSTEMS CONSIDERATION
- ▶ MUNICIPAL GOVERNMENT ACT - MUNI RESPONSIBLE FOR SAFE & SUSTAINABLE COMMUNITIES
  - ▶ HOW?.....UNDERSTANDING OF SAFETY CODES SYSTEMS & ROLE WITHIN



# Variances - Transition to Municipalities

- ▶ The responsibility to assess and issue variances in P&G and PSDS disciplines was transitioned to the Municipalities on October 1, 2019.
  - ▶ In most cases this relates to the subdivision of first parcels out of a quarter section (farm yards).
  - ▶ Municipalities best suited to help guide decisions in concert with the SCO on the suitability to allow a separation distance variance for a proposed subdivision.
    - ▶ It is the SCO who only has the authority to issue the variance
  - ▶ Municipal Affairs will provide support and guidance during the transition.

# VARIANCE - What does that mean?

- ▶ An approval granted that allows an activity or thing to take place that provides an approximately equivalent or greater safety performance.

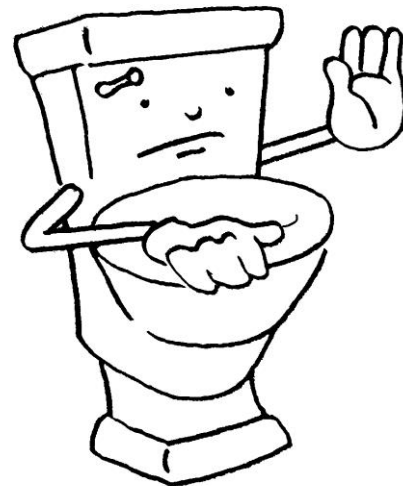


# SAFETY CODES ACT - PART 3, SECTION 38

## Variations

- ▶ An administrator or safety codes officer may issue a written variance with respect to any thing, process or activity to which this Act applies if the Administrator or officer is of the opinion that the variance provides approximately equivalent or greater safety performance with respect to persons and property as that provided for by this Act.

**APPROVED**



## So Where Does The Industry Installer Fit In?

When an owner is considering a subdivision of their property and the existing sewage system may not comply to current codes:

- ▶ A certified installer may be engaged to assess an existing system and provide a design option to support a variance application.
- ▶ If a variance is granted by the SCO, the certified installer may obtain the required permit and do the work required to satisfy the variance conditions.



## So Where Does The Industry Installer Fit In?

When an owner is developing a new property and the site poses certain constraints:

- ▶ A certified installer may be engaged to evaluate the site and provide a design equivalency to support a variance application.
- ▶ If a variance is granted by the SCO, the certified installer may obtain the required permit and do the work required to satisfy the variance conditions.
- ▶ In all cases the approved variance must be in place prior to applying for the permit and any commencement of work.

# VARIANCE APPROVAL: KEY ITEMS

- ▶ SAFETY CODES OFFICER (SCO) REVIEWS A VARIANCE APPLICATION
- ▶ SAFETY CODES OFFICER OR ADMINISTRATOR ISSUES / DENIES A VARIANCE
  - ▶ ACHIEVING APPROXIMATELY EQUIVILANT OR GREATER SAFETY
  - ▶ THOROUGHLY RESEARCH THE MATTER
    - ▶ Real Property Report (RPR) - surveyor identifying exact distances of sewage system to other development considerations
    - ▶ Development constraints - are there phases to development or restrictions of what sewage systems are acceptable for the development use.



# ACCREDITED OR UNACCREDITED?

- ▶ WHAT IS THE DIFFERENCE?
- ▶ EITHER WAY - VARIANCES CAN BE REQUIRED / REQUESTED AND THE MUNI IS A SOURCE OF VALUABLE INFORMATION
- ▶ MUNI ACTS AS SUPPORT ROLE TO SCO, ASSISTING TO MAKE INFORMED DECISIONS FOR VARIANCE APPLICATION REVIEW

# Alberta Safety Codes Authority (ASCA)

- ▶ What the... ASCA?
- ▶ Roles & Responsibilities
- ▶ Variance approval involvement



A Division of the Safety Codes Council

# UNIFORM QUALITY MANAGEMENT PLAN

A SCO may review an alternative solution proposal and issue a site or instance specific variance from a code or referenced standard if the SCO is of the opinion that the alternative solution proposal / variance provides approximately equivalent or greater safety performance with respect to persons and property as that provided for by the Act. An alternative solution proposal / variance will not remove or relax an existing rule, nor be intended to provide product approval.

An alternative solution proposal / variance will be issued in accordance with the Act and Council policy. An alternative solution proposal / variance will be in the format prescribed by the Council.

A request for a variance must:

be made in writing,

be signed by the owner or the owner's representative, and

include support documentation that demonstrates that the variance requested provides equivalent or greater level of safety that is identified by the code, standard or regulation.

A SCO may only make a decision respecting an alternative solution proposal / variance after having thoroughly researched the subject matter.

# WHY DO WE NEED VARIANCES?

- ▶ A Province Wide Standard of Practice Cannot Predict Every Site Scenario!
- ▶ Site Specific vs Administrator Issued Under SCC Policy 9.8
  - ▶ What is the difference?
- ▶ Site Specific Examples
  - ▶ At-Grade Dispersal Systems - adopted in 2015.
  - ▶ Projected Flow Volumes - seeing unique development scenarios.
  - ▶ Phased development - initial phases may not meet full SOP requirements.
  - ▶ Accommodate innovative design scenarios.



# What Resources are Available?

- ▶ Your partners in safety...the front line:
  - ▶ Safety Codes Officers (SCOs)
  - ▶ Accredited Agencies Staff
- ▶ Rural Municipalities of Alberta (RMA)
  - ▶ Guidance Document for Municipalities - Private Sewage System Variance Process
- ▶ Municipal Affairs
  - ▶ Two safety Notices (Standata)
    - ▶ Jurisdictional wide and general variance consideration
    - ▶ Separation distances variance in private sewage discipline
  - ▶ Duty officers with experience in variance consideration
- ▶ Safety Codes Council (SCC)
  - ▶ Variances registered with them
  - ▶ Variance application template

Okay Time  
For Some  
Practice!

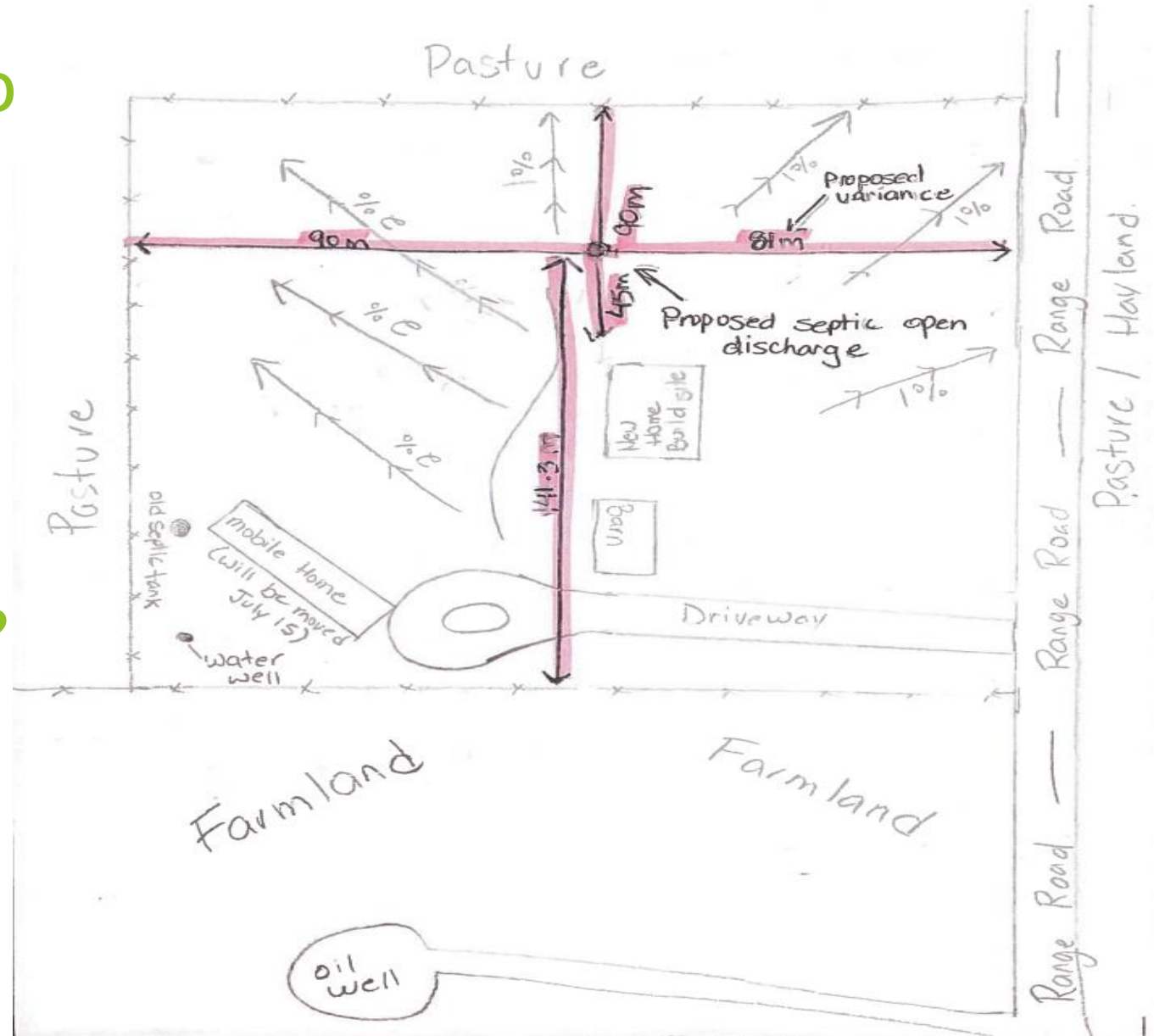
So Where Do  
Start??

Request for Specific Variance	
Explanation of Variance	A Variance is written permission issued to build, install, process, or otherwise act in a manner not consistent with the provision of an applicable code but which provides, in the opinion of the issuing Administrator or Safety Codes Officer, an equivalent or greater level of safety to persons and property. A Variance issued by a Safety Codes Officer is specific. A Variance sets no precedent.
Date of request	Feb 10, 2019
Name and address of owner and/or owner's agent requesting variance	
Code or Standard to be varied	8.7.2.1.1D open discharge to a property line.
Details of proposed variance	We are requesting a 9m variance from open discharge to <u>one</u> of the boundaries.
Reason for variance	Due to property measurements, we are short 5m East to West.
Supporting documentation must be provided (proof of equal or better safety performance - list attachments)	Included: Survey plan, detailed drawing including distances, buildings, slope & water well, vegetation, soil profiles & photo of property.
Address and/or legal description of the property upon which the thing, process or activity which is the subject-matter of the variance is located	NE 19-  lot / block / plan
Authority under which a Variance may be issued	Safety Codes Act & Private Sewage discipline
Declaration of understanding	By signing below, the owner or owner's agent expressly acknowledges that the owner is aware of and agrees with this request for variance, which is intended to provide an alternative to the strict provisions of the Code / standard / regulation, and that it is the responsibility of the owner to provide and maintain safety in accordance with the variance.
Advisement of Offence	Non-compliance with the requirements of a Variance is an offence under the Safety Codes Act.
Identification of owner or owner's agent	Signature _____ Print _____



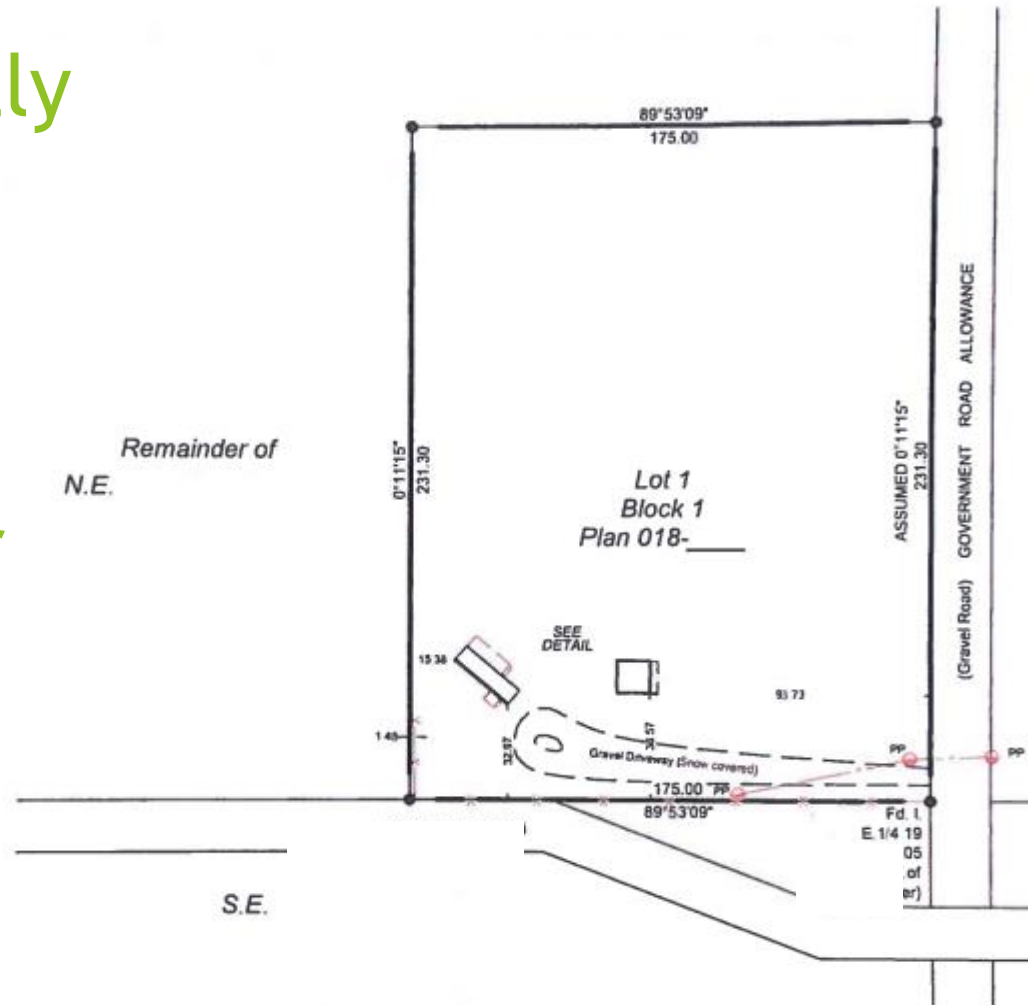
What Else Do We Need?

Maybe Some Site Details Would Help??



What We Really  
Could Use!

Real Property  
Report - clear  
dimensions!



Would have been great to have had the surveyor measure in all separation distances - could have been required at time of subdivision inquiry.

# Other Considerations?

Is the system suitable for the site??

## Alberta Private Sewage Treatment System Soil Profile Log Form

Owner Name or Job ID:															
Legal Land Location						Lot		Block		Plan		GPS Coordinates			
150-174		Sec	Top	Rg	Mer	Full Quarter						Easting		Northing	
Aerial Photos:				N/A				Topography:							
Vegetation notes:				Pasture				Overall site slope %:				7 to 8 %			
								Slope position of system:				Upslope			
Test hole No.		Soil Subgroup			Parent Material			Drainage		Depth of sample #1		Depth of sample #2			
Horizon	Depth (cm) (in)	Texture	Lab or IIT	Colour	Gleying	Mottling	Structure	Grade	Consistence	Moisture	% Coarse Fragments				
A	4"	Loam	Loam	Dark Rich Brown	NO	NO	B Blaky	3	3		1%				
B	4"-21"	Silt Loam - Sandy clay loam	Sandy clay Loam	Light Brown	NO	NO	B Blaky	3	3		1%				
C	21"-68"	Sand clay Loam	Sandy clay Loam	Light Brown	NO	NO	B Blaky	2	2		1%				

Depth to Groundwater	8' +	Limiting Soil Layer Characteristic describe	Structure change to less consistent Blaky	Use soil names, descriptions and particle size limits found in the Canadian System of Soil Classification (CSCC).
Depth to Seasonally Saturated Soil	8' +	Depth to Limiting Soil Layer	8' +	
Limiting Topography	large slope Area	Depth to Highly Permeable Layer	None found	
Key Limiting System Design Characteristic	keeping open discharge from moving laterally			
Weather Condition notes:	Raining			
Comments:				

# Confirming the Details!

Address: \_\_\_\_\_

Phone: \_\_\_\_\_

Report By: \_\_\_\_\_

Chain of Custody: COC 111616

PO#: —

Sample ID: \_\_\_\_\_  
Soil - Horizon C

Test Parameter	Analytical Test Results		
Result ID: _____	Sample Type: Soil Typing - Hydrometer		
Description of Sample: 26.8 °C Light brown soil in a small ziploc bag	Measured Results	Units	Literature Reference Test Method Used
Density	2027.0838	kg/m <sup>3</sup>	Carter & Gregorich 2007
Soil Moisture	21.18	% water (w/w)	Carter & Gregorich 2007
Soil Classification			
- Clay (<53 microns)	32.99	%	
- Silt (53-75 microns)	12.69	%	Hydrometer
- Sand (>75 microns)	54.33	%	
Sand Details			
- Coarse (>425 microns)	N/A	%	
- Medium (250-425 microns)	N/A	%	Sieve Analysis
- Fine (75-250 microns)	N/A	%	
Class	Coarse Sandy Clay Loam		
NOTE			

They Say A Picture Is Worth A Thousand Words!!



But there is more needed to support a variance application.

# So What Can We Conclude?

Here is what we know:

- ▶ The tentative plan provided for a parcel with dimensions of 175 m by 231 m.
- ▶ The east-west dimension would not allow for prescribed separation distances in the SOP.

The following points need to be considered in this review:

- ▶ What percentage of the prescribed separation distance is being asked for
  - ▶ 9 m of 90 m is approx. 10%
- ▶ All other separation distances comply
- ▶ What potential risks if any would be associated to the reduced distance
  - ▶ Reduction is to the road R/W - Low risk
- ▶ Site appears to be well drained farmland
- ▶ Soil profile does not encounter any limiting conditions within the required vertical separation

The Decision:

- ▶ the risk and reduction is minimal so a variance was considered in this case.

# What Other Aspects Impact Consideration?

- ▶ When the site was developed.
  - ▶ Compliant to the code of the day
  - ▶ Dec 1997 to Aug 1990 - property line setback was 45m (150ft)
  - ▶ Quarter sectional property lines never change
- ▶ Is there a water well involved.
  - ▶ Health may need to issue a Waiver
- ▶ Easements registered on title
  - ▶ Road widening - can take 30 to 60 m from properties
  - ▶ Utilities - some have restrictions within their right-of-way
- ▶ Conservation Land and Environmental Reserves.
- ▶ Surface Waters and Other Natural Features.

# What Other Aspects Impact Consideration?

## ▶ Adjacent Land Use.

- ▶ Nearest neighbor 2 miles away
- ▶ School right next door

## ▶ Land Use Restrictions.

- ▶ One parcel out per quarter
- ▶ Bylaws- first parcel out restriction to 5 acres

## ▶ Is a variance even necessary?

- ▶ Maybe a compliance letter issued to clarify met code of the day
- ▶ Attach in support of subdivision application



Questions???

