

## Baaritaanka Ceelka, Natiijooyinka, iyo Fursadaha

Maadaama oo aad taahay mulkiilaha ceelka gaarka loo leeyahay, waxaad mas'uul ka tahay inaad si joogto ah u tijaabiso biyaha aad u isticmaalayso karinta iyo cabbitaanka si aad u hubiso inay ammaan yihiin. Waaxda caafimaadka ee Minnesota (MDH) waxay ku talinaysaa in aad biyaha ka baarto tuubada aad u isticmaalayso karinta iyo cabbitaanka iyo in aad ka baarto wasakheeyeyaasha ku jira shaxda hoose. Haddii aad daaweyso biyahaaga,baaritaan ku sameeya biyaha kadib marka ay maraan daaweynta. Ka baaritaanka dhammaan wasakheeyeyaasha hoose aaya si gaar ah muhiim u ah haddii dhallaan ama carruurta yaryar ay cabbaan biyaha (fiiri [Biyaha Badbaadada u ah Cabitaanka Ilmahaaga \[PDF\]](#) ([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/safebaby.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/safebaby.pdf)) (kaliya waxaa lagu heli karaa Ingiriisi iyo Isbaanish wakhtigan)).

### Waxa ay tahay in laga baaro biyaha ceelkaaga

Wasakheeyaha	Inta jeer ee ay tahay in Ceelka la Baaro	Waxyaalaha Saameeya Caafimaadka
Bakteeriyyada Coliform	Sanad kasta	Bakteeriyyada Coliform waxay tilmaami kartaa in bakteeriyyada kale ee cudurada faafiya, fayrasyada, ama dulinno laga yaabo inay ku jiraan biyahaaga. Kuwani waxay keeni karaan shuban, matag, calool casiraad, lallabbo, madax-xanuun, qandho, iyo daal.
Nitrate	Sannad dhaaf kasta	In ay jirkaaga gasho nitrate badan wuxuu saameyn karaa sida dhiiggu u qaado ogsijiinta wuxuuna keeni karaa cilladda ilmaha buluuga ah (blue baby syndrome). Ilmaha dhalada lagu quudiyo ee ka yar lix billood aaya waxay halis ugu jiraan inay saamayso Nitrate-ka. Cilladda ilmaha buluuga noqda waxay keeni kartaa jirro halis ah ama dhimasho.
Arsenik	Ugu yaraan hal mar	Cunista/in ay jirkaaga galaan biyaha leh xitaa heerar arsenik ah oo hooseeya muddo dheer aaya waxaa lala xiriiriyyaa sonkorowga iyo khatarta sii kordha ee kansarada kaadi haysta, sambabada, beerka, iyo xubnaha kale. Liqitaanka arsenik waxay sidoo kale

		gacan ka geysan kartaa cudurrada wadnaha iyo xiddiddada; garaadka carruurta oo yaraada; iyo dhibaatooyinka maqaarka sida nabarada, midabka oo doorsooma, iyo soo baxyada buroyinka nabarada ah. Saamaynta caafimaad ee arsenik waxay qaadan kartaa sanado badan inay soo baxdo.
Macdanta Liidh	Ugu yaraan hal mar	Sunta rasaastu waxay dhaawici kartaa maskaxda, kelyaha, iyo habdhiska dareenka. Sunta rasaastu waxa kale oo ay hoos u dhigi kartaa korriinka ama waxa ay sababi kartaa dhibaatooyinka waxbarashada, hab dhaqanka, iyo maqalka. Inkastoo ay sunta rasaastu saamayn karto qof walba, dhallaanka, carruurta da'doodu ka yar tahay lix sano, iyo haweenka uurka leh ayaa waxay ku jiraan khatarta ugu badan ee caafimaad ee ka timaada rasaasta.
Mangaaniis	Ugu yaraan hal mar ka hor inta uusan ilmuu cabin biyaha	Manganese waxay sababi kartaa dhibaatooyinka dhanka xusuusta, dareenka, iyo xirfadaha dhaqdhacaqaa muruqyada. Waxaa kale oo ay dhallaanka iyo carruurta u keeni kartaa dhibaatooyinka waxbarashada iyo hab dhaqanka.

Ilaha dabiciiga ah iyo hawlaha bani'aadamka labaduba waxay wasakhayn karaan biyaha ceelka waxayna sababi karaan saamayn caafimaad oo muddo gaaban ama mid dheer. Tijaabinta biyaha ceelkaagu waa habka kaliya ee loogu ogaan karo inta badan wasakhooyinka caadiga ah ee ku jira biyaha dhulka hoose ee Minnesota; ma dhadhamin kartid, ma arki kartid, mana urin kartid inta badan wasakheeyeyaasha.

Waxa kale oo laga yaabaa inaad u baahato inaad ka baarto wasakheeyeyaasha kale haddii aad qabto walaac kale oo tayada biyaha ah ama aad ku nooshahay aag lagu ogyahay in ay wasakhaysanyihiin biyaha dhulka hoostiisa ku jira. Ka baro wax badan oo ku saabsan mawduucyada tayada biyaha ceelasha gaarka loo leeyahay Tayada Biyaha/Baarita Ceelka/Jeermis ka Dilista Ceelka

([www.health.state.mn.us/communities/environment/water/wells/waterquality/index.html](http://www.health.state.mn.us/communities/environment/water/wells/waterquality/index.html))  
(kaliya waxaa lagu heli karaa Ingiriisi wakhtigan).

## Wax badan ka baro Wasakheeyeyaasha kor lagu sheegay

- Bakteeriyada  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/bacteriasom.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/bacteriasom.pdf))
- Nitrate  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/nitratesom.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/nitratesom.pdf))

- Arsenik  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/arsenicsom.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/arsenicsom.pdf))
- Liidhka/Sunta Rasaasta  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/leadsom.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/leadsom.pdf))
- Manganiis-ka  
([www.health.state.mn.us/communities/environment/water/contaminants/manganese.html](http://www.health.state.mn.us/communities/environment/water/contaminants/manganese.html)) (kaliya waxaa lagu heli karaa Ingiriisi wakhtigan).

## Sida loo baaro biyaha ceelka biyaha

La xiriir shaybaar la aqoonsan yahay si aad u hesho weel muunad lagu soo qaado iyo tilmaamo ama weydii adeegyada deegaanka ama caafimaadka ee degmadaada in ay bixiyaan adeegyo baarista ceelasha. Ka dib marka shaybaarka lafaguro muunadaada biyaha, shaybaarka ayaa kuu soo diri doona warbixin ay ku jirto natijada baaritaanku.

## Hel Shaybaaraha Biyaha oo La Shahaadeeyey

MDH waxay shahaadaysay shaybaarada si ay u hubiso inay isticmaalaan hababka iyo halbeegyo ku siin doona maclumaaad sax ah oo ku saabsan tayada biyahaaga. Hoos waxaa ku jira laba hab oo lagu helo shaybaar la aqoonsan yahay. MDH waxay ku talinaysaa in lala xiriiro dhawr shaybaar si la isu barbardhigo kharashaadka.

- Shaybaarada La aqoonsan yahay ee Minnesota ee Aqbala Muunadaha ay mulkiilayaashu kasoo qaadaan Ceelka Gaarka loo leeyahay) [PDF]  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/labmap.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/labmap.pdf)) (keliya waxaa lagu heli karaa Ingiriisiga wakhtigan). Khariidaddan iyo shaxdani waxay muujinayaan shaybaarrada ay aqoonsantahay MDH oo ku yaalla Minnesota kuwaas oo aqbala muunado ka yimaadda milkiileyaasha ceelasha gaarka ah waxaana shahaado loo siiyeen inay ka baaraan arsenik, bakteeriyyada coliform, liidh, manganese, iyo/ama nitrate.
- Raadi Shaybaarada la Aqoonsan yahay  
(<https://eldo.web.health.state.mn.us/public/accreditedlabs/labsearch.seam>) (kaliya waxaa lagu heli karaa Ingiriisiga waqtigan waqtigan): Wuxaad raadin kartaa dhammaan Shaybaarada MDH aqoonsan tahay ee Maraykanka.
  1. Dooro khaanada **Customized Searches**; ee "Barnaamjka" dooro **Safe Drinking Water Program**; kadibna dooro falanqaynta (wasakhowga) ay tahay in laga baaro.
  2. Xagga hoose ee bogga calaamadee sanduuqa ay ku qorantahay **Accepts samples from private homeowners** oo guji **Search**.
  3. Liistada ka soo baxaysaa waa shaybaarada loo shahaadeeyey in ay baaraan wasakhdaas.

## Maxa uu macnaha natijadaada baaritaanku yahay iyo tillaaboyinka xiga

Shaybaar kastaa waxa laga yaabaa inuu si gooni ah uga warbixiyo natijjooyinkaaga. Shaxda hoose waxay taxayaa wasakheeyeyaasha ugu badan ee MDH ay kugula talinayso inaad ka baarto, heerka waxyeelada ku keeni kara biyahaaga la cabbo, iyo waxa aad samayn karto si aad

u ilaalo caafimaadka qoyskaaga. Fadlan la xiriir shaybaarka ama MDH wixii su'aalo ah ee ku saabsan natijjooyinkaaga.

<b>Wasakheeyaha</b>	<b>Biyaha la cabbo waxay noqon karaan kuwo Waxyeelo leh haddii:</b>	<b>Waxa la sameeyo haddii uu jiro heer wasakhow oo aan ammaan ahayn</b>
Bakteeriyyada Coliform	Bakteeriyyada coliform ah ahaa in uu laga helay	<ol style="list-style-type: none"> <li>1. Muddada gaaban, haddii Nitrate aan laga helin, waxaad karkarin kartaa biyahaaga 1 daqiqo ka hor inta aanad u isticmaalin cabitaanka ama wax karinta. Ama ka hel biyahaaga meelo kale oo badbaado leh (sida biyaha dhalada ah).</li> <li>2. Ku nadiifi ceelkaaga iyo nidaamka biyaha qasitaan koloriin ah (ka fiiri tilmaamaha <u>Well Disinfection</u> (<a href="http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/disinfectionsom.pdf">www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/disinfectionsom.pdf</a>) ama kirayso qandaraasle ceel oo shati leh si aad jeermiska uga disho ceelkaaga).</li> <li>3. Mar labaad baara biyihina kadib markaad jeermiska ka dishaan ceelka iyo nidaamka biyaha.</li> </ol>
Nitrate	Heerku wuxuu ka sarreeyaa 10 mg/L*	<ol style="list-style-type: none"> <li>1. Ka hel biyahaaga meelo kale oo badbaado leh (sida biyaha dhalada ah) ilaa oo aad wax ka qabato dhibaatada. <b>HA</b> karkarin biyaha - karkarintu waxay kordhin doontaa xaddiga nitrate-ka.</li> <li>2. Ha siin biyaha dhallaanka ka yar lix bilood jir.</li> <li>3. Qandaraasle baara ceelasha oo shati haysta ha baaro oo ha dayactiro ceelkaaga.</li> <li>4. Ka saar ilaha nitrate-ka ee suurtagalka ah ceelkaaga agagaarkiisa.</li> <li>5. Tixgeli ku daaweynta biyaha guriga haddii tillabooyinka 3 iyo 4 ay xallin waayaan dhibaatada oo aysan dhallaan cabaynin biyaha.</li> <li>6. Mar labaad tijaabi biyahaaga kadib markaad daawaynta ku rakibto.</li> </ol>
Arsenik	Heer kasta oo arsenik ah ayaa laga yaabaa	<ol style="list-style-type: none"> <li>1. Tixgeli daaweynta biyaha ee guriga ama isticmaal ilo kale oo biyaha la cabbo ah. Kahor intaadan</li> </ol>

	inuu waxyeelo leeyahay. MDH waxay aad ugu talinaysaa inaad tillaabo badbaadi in laga qaado haddii heerka arsenik ku jira biyhaaga la caboo uu ka sarreeyo 10 µg/L.	<p>samaynin ku daaweynta biyaha guriga, waxaa laga yaabaa inay wanaagsan tahay in dib loo eego heerarka arsenik.</p> <p>2. Mar labaad tijaabi biyahaaga kadib markaad daawaynta ku rakibto.</p>
Macdanta Liidh	Heer kasta oo sunta rasaas ahi wax waxyeello ayuu leeyahay.	<p>1. U ogolow biyuhu inay socdaan ugu yaraan 1 daqiqo kahor inta aadan u isticmaalin wax karinta ama cabitaanka.</p> <p>2. U isticmaal biyo qabow cunto karinta iyo cabbitaanka.</p> <p>3. Shaqaalee farsamayaqaanka tuubooyinka si uu u soo helo halka ay ka imanayso liidhka ku jira nidaamkaaga tuubooyinku oo tixgeli in aad bedeshaan qaybtaas ka midka ah nidaamka tuubada.</p> <p>4. Tixgeli inaad hesho garaafaha/koobka filtarka leh ama daaweynta biyaha ee guriga oo u shahaadysan in ay ka saarto liidh haddii aadan heli karin meeshay ay liidh ka imanayso oo ay socodiinta/furitaanka tuunbada si biyuhu u yara socdaan ayna dhimaynin heerarka liidh.</p> <p>5. Mar labaad tijaabi biyahaaga kadib markaad daawaynta ku rakibto.</p>
Mangaaniis	Dhallaanka jira hal sano: Heerarka manganiis wuu ka sarreeyaa 100µg/L**  Dadka kale oo dhan: Heerarka manganiis wuu ka sarreeyaa 300µg/L**	<p>1. Iisticmaal biyo kale markaad u isticmaalayso biyaha in aad samayso caanaha ama casiirka ilmaha.</p> <p>2. Tixgeli inaad hesho garaafaha/koobka filtarka leh ama daaweynta biyaha ee guriga.</p> <p>3. Mar labaad tijaabi biyahaaga kadib markaad daawaynta ku rakibto.</p>

\*mg/L=miligram halkii litirba oo waxay la mid tahay qaybo halkii milyanba (ppm)

\*\*µg/L=makrogaram halkii litir oo waxay la mid tahay qaybo halkii bilyanba (ppb)

## Macluumaaad dheeraad ah

- Badbaadida Bakteeriyada ku jirta Biyaha Ceelka  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/bacteriasom.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/bacteriasom.pdf)).
- Nitrite ku jirta Biyaha Ceelka  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/nitratesom.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/nitratesom.pdf))
- Arsenik ku jirta Biyaha Ceelka  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/arsenicsom.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/arsenicsom.pdf)).
- Liidhka/Sunta Rasaasta ee ku jirta Biyaha Ceelka  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/leadsom.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/leadsom.pdf))
- Manganiis-ka ku jirta Biyaha la cabbo  
([www.health.state.mn.us/communities/environment/water/contaminants/man-ganese.html](http://www.health.state.mn.us/communities/environment/water/contaminants/man-ganese.html)) (kaliya waxaa lagu heli karaa Ingiriisi wakhtigan).
- Tayada Biyaha/Baarita Ceelka/Jeermis ka Dilista Ceelka  
([www.health.state.mn.us/communities/environment/water/wells/waterquality/index.html](http://www.health.state.mn.us/communities/environment/water/wells/waterquality/index.html)) (kaliya waxaa lagu heli karaa Ingiriisi wakhtigan).

## Baro wax badan oo ku saabsan fursadaha daaweynta biyaha

- Ku Daaweynta Biyaha Guriga  
([www.health.state.mn.us/communities/environment/water/factsheet/hometreatment.html](http://www.health.state.mn.us/communities/environment/water/factsheet/hometreatment.html)) (kaliya waxaa lagu heli karaa Ingiriisi wakhtigan): Xulashooyinka guud ee daawaynta.
- Unugyada Daaweynta Biyaha ee Dhimista Arsenik [PDF]  
([www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/arsenic\\_treatment.pdf](http://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/arsenic_treatment.pdf)) (kaliya waxaa lagu heli karaa Ingiriisi wakhtigan)
- Amaahda ku Daaweynta Biyaha Guriga iyo Dhismaha Ceelka, Dayactirka, iyo Xiritaanka  
([www.health.state.mn.us/communities/environment/water/wells/sealing/loans.html](http://www.health.state.mn.us/communities/environment/water/wells/sealing/loans.html)) (kaliya waxaa lagu heli karaa Ingiriisi wakhtigan) Deeqo iyo deymo si ay kaaga caawiyaan daboolida kharashka ku rakibida unuga ku daawaynta biyaha guriga.

Si aad macluumaadkan ugu hesho qaab kale, soo wac 651-201-4600.  
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