

Re: molarity

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- *From:* "Dr_Dickie" <Dr_Dicke@xxxxxxxxxxxxxx>
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"John Doe III" <john_doeIII@xxxxxxxxxx> wrote in message
[news:D8nFe.8452\\$dU3.3134@xx](mailto:news:D8nFe.8452$dU3.3134@xx)

- >
> Let's assume 100 g of NaCl (MW = 58 g./ mol) is dissolved in 3.5 L of water.
> Is the molarity
> A) $100 / (58 * 3.5)$
> or
> because NaCl dissociates into 2 ions
> B) $2 * 100 / (58 * 3.5)$
>
> ???
>
> What is the molarity of a salt solution?
>
> is it the number of moles of all dissociated solutes that are dissolved in
> the solvent divided by liter of solvent????
>
>

I must applaud you for thinking.

Of course, as others have pointed out, since it is the molarity of the salt you are interested in, you do not combine the ions (as the salt is both ions).

The problem becomes a bit more tricky when it is a di (or tri) valent salt.

For instance, a 1.0 M solution of sodium carbonate would be 2.0 M in sodium ions, and 1.0 M in carbonate ions.

If that makes sense, then you are ahead of most introductory college students.

—

Dr. Dickie

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Poking kooks with a pointy stick.

"The most exciting phrase to hear in science, the one that heralds new discoveries,

is not 'Eureka!' ('I found it!'), but rather 'hmm....that's funny...'"

— Isaac Asimov

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