

## Mongoose Methods and Their Middleware Support

Method	Pre Middleware	Post Middleware	Notes
<code>doc.save()</code>	Yes	Yes	Document-level; triggers <code>pre('save')</code> and <code>post('save')</code>
<code>Model.create()</code>	Yes (via save hooks)	Yes (via save hooks)	Internally calls <code>doc.save()</code> for each doc
<code>doc.remove()</code>	Yes	Yes	Document-level removal (deprecated in favor of query delete methods)
<code>Model.insertMany()</code>	No	No	Bypasses middleware for performance reasons
<code>updateOne()</code>	Yes (query middleware)	Yes (query middleware)	Validations are off by default (enable with <code>{ runValidators: true }</code> )
<code>updateMany()</code>	Yes (query middleware)	Yes (query middleware)	Use <code>{ runValidators: true }</code> for validations
<code>findOneAndUpdate()</code>	Yes (query middleware)	Yes (query middleware)	Alias: <code>findByIdAndUpdate()</code> works similarly; enable validations via <code>{ runValidators: true }</code>
<code>findByIdAndUpdate()</code>	Yes (query middleware)	Yes (query middleware)	Alias for <code>findOneAndUpdate()</code>
<code>deleteOne()</code>	Yes (query middleware)	Yes (query middleware)	For query-based deletion
<code>deleteMany()</code>	Yes (query middleware)	Yes (query middleware)	For bulk deletion
<code>findOneAndDelete()</code>	Yes (query middleware)	Yes (query middleware)	Alias: <code>findByIdAndDelete()</code> works similarly
<code>findByIdAndDelete()</code>	Yes (query middleware)	Yes (query middleware)	Alias for <code>findOneAndDelete()</code>
<code>find()</code>	Yes (query middleware)	Yes (query middleware)	Read operation; validations are not applicable
<code>findOne()</code>	Yes (query middleware)	Yes (query middleware)	Read operation; validations are not applicable
<code>findById()</code>	Yes (query middleware)	Yes (query middleware)	Alias for <code>findOne({_id: ...})</code>