Jackson serialization Strategy verses problem area

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| **Serialization Problem Area** | **Convention Only**  Require that the objects serialize and deserialize with no annotations from the framework | **Custom (De)Serializer**  Custom code that encodes/decodes member properties to/from a Jackson JSON tree document | **Annotations(MixIn Shown)**  Annotations provide hits to non-conventional behavior to the Object Mapper. Hints stored in a interface/abstract class are called MixIns |
| Read only data transfer objects | * Requires the creation of no arg constructors to create objects. May be private. * Requires the creation of setters. May be private. | * Requires maintenance of at least a Desearializer and probably a Serializer. (Large maintenance effort) | * Use the @Constructor/ @JsonCreator annotation to specify property inputs and order. |
| Derived value responses or hidden members. | * Requires that the object mapper be set to not strict mode where extraneous properties are permitted. * Side load get/set must be created. * Getters operating members must be initialized or nullary compliant. (Getter must be public) | * Requires maintenance of at least a Desearializer and probably a Serializer. (Large maintenance effort) * Best strategy for handling these hard to solve problems. | * Special private constructor with @Constructor annotation and additional properties exported. |
| Type erasure for super class lists | * Must implement extraneous property map convention using @JsonAnyGetter and @JsonAnySetter to avoid data loss. * Custom code to handle cast compatibility and 2x the objects would have to be created. The first is for the agreggate super type object and the second is the specific implementation. | * Requires maintenance of at least a Desearializer and probably a Serializer. (Large maintenance effort) | * Use @JsonTypeInfo, @JsonTypeInfo, and @JsonSubTypes to encode class type in string and have jackson automatically process it to the proper sub class. |