



Intellectual Property and Rights to Noncommercial Computer Software in the DoD Environment

Software Collaborators' Conference

Charlene Gross
Software Engineering Institute
Carnegie Mellon University
Pittsburgh, PA 15213
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Background

Army Contracting Workshop – May 13-14, 2008

- Attendees: PEO representatives from across the Army
- Loosely structured discussion to determine pain points of current programs that could have been prevented by better RFPs and contracts
- Software rights loomed large
 - How do you resolve problems related to **intellectual property, sharing across contractors**, proprietary solutions?
 - How do we avoid the problem of **software issues coming up late** (license, data rights...)?
 - Why don't commercial practices apply?
 - How can we **create and clarify DoD regulations** for contracting software acquisition, including policies on data rights. . . .?



A Chance Encounter

A developer/contractor was selling logistics software to the services and was concerned about competitors being able to see his code.

- Original code developed at private expense by contractor's company.
- Contractor's company merged with another company under new name, and contractor was a partner.
- A large software company added money to the pot to further develop the product.
- A piece of the product was developed under contract to one of the services.
- There were no discussions about rights to the intellectual property or software licenses.



Army Workshop - Acquiring Rights to Computer Software and Technical Data

Presented in November 2008 to representatives of Army PEOs and SECs. Contracting officers from Army Materiel Command also attended.

- Increase the **visibility** of the regulations governing rights to computer software in the DoD environment
- Promote the **development of strategies** for acquiring rights to software **as an upfront activity** integral with the acquisition strategy
- Provide the insights to **identify software rights needs** and incorporate appropriate language into the design of the **project's Request for Proposal (RFP)**



Workshop Agenda

- *Problem Identification* – Identify what you have to do by life cycle phase or what could happen (events or “speed bumps”) to impact data rights throughout the product lifecycle
- *Familiarization with Alternatives for Types of Rights and Obtaining Them* – Determine the level of data rights that you believe is appropriate and your alternatives for obtaining those data rights
- *Development of Selection Criteria to Apply to Alternatives for Obtaining Rights* – Determine criteria to select your best alternative and the cost/benefit in negotiating data rights using these criteria
- *Review of Data Rights Clauses* – Select data rights clauses for inclusion in your solicitation and contracts
- *Development of Contingency Plans* – Determine your alternatives if you cannot acquire the level of rights that you want



Focus on Problem Identification

Software criticality issues:

- Changes to integration and interface needs; software reuse; insufficient reliability, availability, and maintainability (RAM); discovery of high risk vulnerabilities.

Programmatic element issues:

- Changes in policies; inadequate market research; contractual changes; lack of software documentation; budget cuts and inadequate estimation practices; decisions regarding Joint and foreign government use; lack of appropriate planning for sustainment; changing information assurance certification and accreditation



Focus on Problem Identification

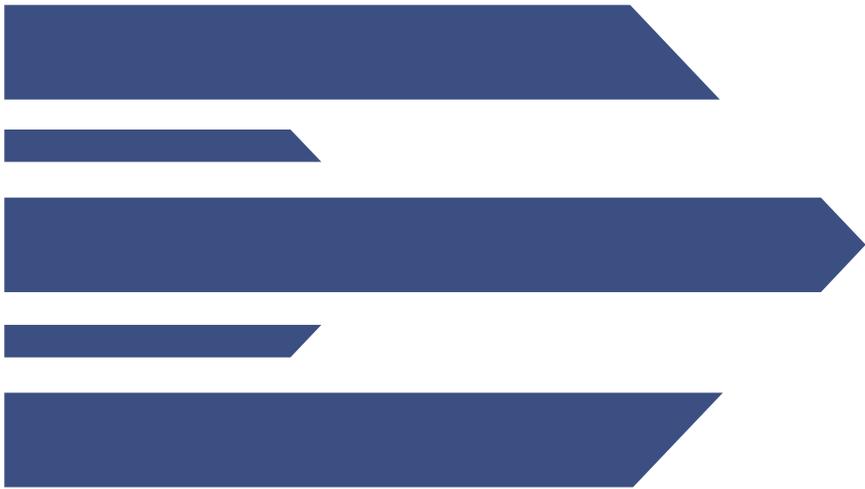
Market issues:

- Change in COTS ownership; bankruptcy of intellectual property owner; obsolescence of environment and platform; commercial sales of software that could include customized code for Government

Life cycle issues:

- Changes in requirements including safety and security, backwards compatibility, inadequate technical feasibility and technical readiness levels, introduction of IRAD technology with restricted rights; poor post-deployment support capability and/or transition plan, inability to meet requirements of performance, increased interoperability requirements, including between COTs and noncommercial software; blocking slips; additional post-deployment requirements, including security reaccreditation





DoD Rules and Regulations



Intellectual Property vs. Licensing - Current Department of Defense Framework

- DoD does not “own” the technical data and computer software included in deliverables, even if the Department paid for 100 percent of the development costs.
- As a general rule under Government contracts, the contractor-developer is allowed to retain ownership of the technical data and computer software it developed.
- The Government receives only a license to use that technical data and computer software.
- The scope of the license depends on the nature of the technical data and computer software, the relative source of funding for development, and the negotiations between the parties.

REF: OUSD AT&L, *Intellectual Property: Navigating Through Commercial Waters*. October 2001.



License Rights in Computer Software

Federal Acquisition Regulation (FAR) – takes precedence over all other regulations

Defense Federal Acquisition Regulation Supplement (**DFARS**) – includes DoD-unique process for acquiring intellectual property (IP) license rights for computer software that is developed or delivered under a contract.

- **DFARS SUBPART 227.72** - Rights In Computer Software and Computer Software Documentation
 - Prescribes **policies and procedures** for the acquisition of computer software and computer software documentation, and the rights to use, modify, reproduce, release, perform, display, or disclose such software or documentation
 - Does not apply to computer software or computer software documentation acquired **under GSA schedule contracts**
- **DFARS SUBPART 252.227** – In combination with **FAR**, provides **contract clauses** for inclusion in RFPs and contracts



High Level Explanation of Rights

Rights that a licensor grants to the Government are:

- Unlimited rights
- Government purpose rights
- Restricted rights (noncommercial computer software and software documentation)
- Specifically negotiated license rights
- Prior Government Rights
- Commercial license



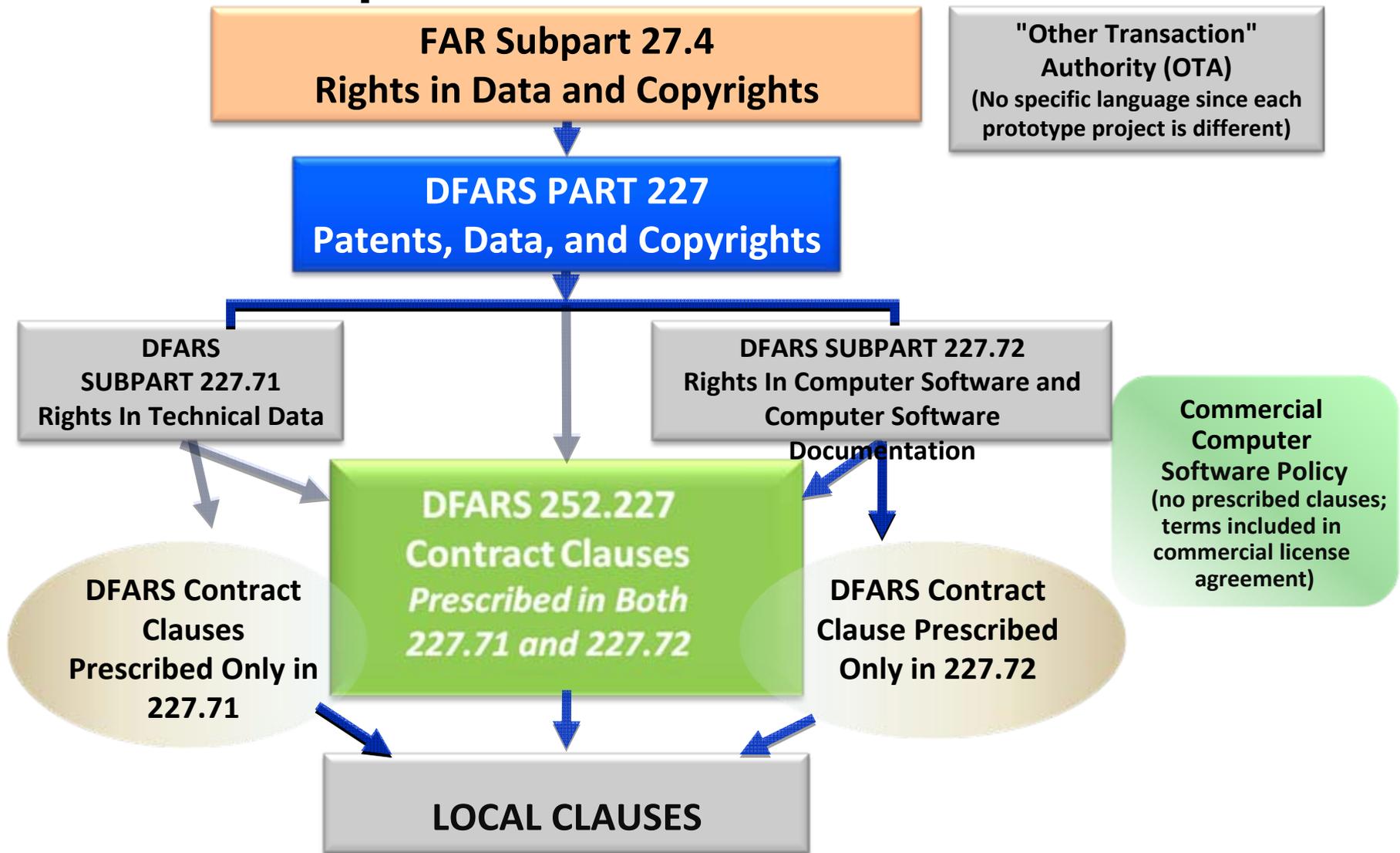
"Other Transaction" Authority (OTA)

- Awarded pursuant to authority of 10 U.S.C. 2371 and **generally not subject to the Federal Acquisition Regulation (FAR)**, its supplements, or laws that are limited in applicability to procurement contracts
- Two types of commonly-used OTs
 1. "Other Transactions" for **prototype projects** – authorized under certain circumstances for prototype projects directly relevant to weapons or weapon systems proposed to be acquired or developed by the DoD.
 2. "Other Transactions" for **basic, applied or advanced research projects** in accordance with 10 U.S.C. 2371
- OT for prototype authority provides **flexibility to negotiate terms and conditions appropriate for the acquisition**

REF: "Other Transactions" (OT) Guide For Prototype Projects. Under Secretary Of Defense For Acquisition, Technology And Logistics. January 2001.



DFARS Subparts and Contract Clauses



Comparison of Licensed Rights

UNLIMITED RIGHTS

Broad use and disclosure by Government for any purpose whatsoever and for commercial purpose

Developed exclusively with Government funds

GOVERNMENT PURPOSE RIGHTS – GPR

Disclosure within Government; disclosure outside for Government purposes; supports commercial development by developer; GPR period negotiated; after GPR period, becomes unlimited rights

Developed with mixed funding

RESTRICTED RIGHTS (NONCOMMERCIAL COMPUTER SW)

Limited to one terminal or central processing unit; transfer to other Gov't agency without permission; contractors can diagnose, modify etc with signed disclosure agreement

Developed exclusively at private expense



Comparison of Licensed Rights (cont.)

SPECIFICALLY NEGOTIATED RIGHTS

Modifications to unlimited, GPR, and restricted rights by mutual agreement; shall not provide the Government lesser rights than in previous clauses; contractors are not required to provide the additional rights

Developed by any funding type

PRIOR GOVERNMENT RIGHTS

Terms based on pre-existing rights, unless—

- (i) The parties have agreed otherwise; or
- (ii) Any restrictions have expired or no longer apply

Developed by any funding types

Note: Commercial Software

There is no specific contract clause governing the Government's rights in commercial computer software or commercial computer software documentation per 227.72. User rights are **the same as those of the public** and included in the commercial license agreement.



How Much Do You Acquire?

DoD policy for
noncommercial computer software is:

*“acquire only the computer software and
computer software documentation and **the
rights** in such software or documentation,
necessary to satisfy agency needs”*

[DFARS 227.7203-1].

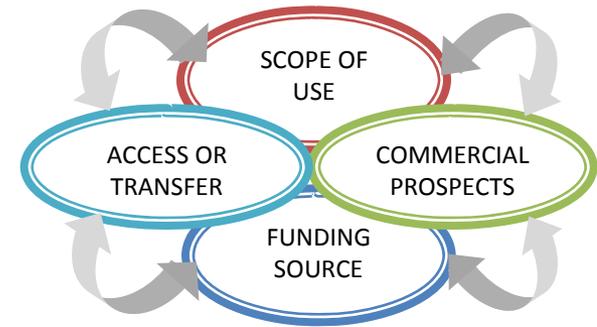


When Do You Plan for Rights That Will Be Acquired?

- DoD requires that the Data Management Strategy (DMS), which is part of the Acquisition Strategy, **include a licensing strategy** for noncommercial computer software.
- These documents must be completed **prior to the solicitation.**
- Based on this strategy, the contractor will provide a **list of all noncommercial software products that have restrictions** as part of the **proposal** and **prior to award** of a contract.



Four Questions to Identify Choices for Noncommercial Software License Rights



1. Who **needs to use or modify** the product at various times of the lifecycle and to what extent?
2. What restrictions on **access by terminals and central processing units** or **on transfer** to other government agencies are acceptable?
3. Are there any plans that the product will be developed or used for **commercial purposes**?
4. Who is going to **fund or has funded** the noncommercial computer software development and to what extent?



Mapping Needs to License Types

<i>STANDARD NONCOMMERCIAL COMPUTER SOFTWARE LICENSE CHOICES</i>			
Unlimited Rights		Government Purpose Rights	Restricted Rights
Distinguishing Characteristics	<i>DISTINGUISHING CHARACTERISTIC OPTIONS BY LICENSE TYPE</i>		
<i>Scope of Use?</i>	Any use for any purpose by anyone the government authorizes	Inside government – disclosure required if other than contractor or subs of the government contract Outside government – only with express written permission of contractor/developer Reverts to unlimited rights after GPR expires.	Permission to diagnose, modify or merge software; respond to tactical situations and perform emergency repairs. Notification to rights owner and no reverse engineering
<i>Access or Transfer?</i>	Inside and Outside government – No Limit	Inside government - transfer to other agencies without restriction on access; contractors and subs working on government contract can access; reverts to unlimited rights after GPR expires.	Use of one software instance and by one agency at a time
<i>Commercial Prospects?</i>	Government commercializes or authorize others to commercialize	Contractor/developer commercializes during GPR; reverts to unlimited rights after GPR expires.	Commercialization solely contractor/ developer
<i>Funding Source?</i>	Solely government funding	Mixed funding	Private expense



Defining Agency Needs

Question: What drives the formation of agency needs and the ultimate decision on a licensing strategy for noncommercial computer software?

1. Identify assumptions.
2. Construct one or more high-level statements that describe the government's plan to support the assumption.
3. Identify the necessary capabilities/decision drivers that the government must have to be successful with its plan.
4. Assign a numerical or rank order score to each decision driver to distinguish higher priorities from lower ones.
5. Select the option that best supports each decision driver.
6. Review the selections and the priority weights to select the best option.



Example of the Path from Assumptions to Needs for Scope of Use

Software Criticality – Scale, Reliance, Complexity

Assumption: The system is highly reliant on the software and complex, so is critical to the system.

Plan: The government must ensure operations and availability during the life of the system.

Capability/Decision Drivers: To support the plan, the government must have:

- access to all code, tools, test scripts, etc to repair defects;
- legal rights to perform any necessary work or authorize others to do it,
- authority to engage competing contractor, if necessary, to perform work, including creating derivative works,
- qualified talent available during life cycle that knows how to work with the software.



Example of the Path from Assumptions to Needs for Scope of Use -2

AGENCY NEED FOR SCOPE OF USE		
Any use for any purpose by anyone that the Government authorizes	Inside Government – disclosure required if other than contractor or subs of the government contract Outside Government – only with written permission	Only permission to diagnose, modify or merge software; respond to tactical situations and perform emergency repairs.

CRITICALITY ASSUMPTION: The system is highly reliant on the software and complex, so is critical to the system.

CRITICALITY PLAN: The government will ensure operations and availability during the life of the system.

CAPABILITY/ DECISION DRIVERS	Criticality - access to all code, tools, test scripts, etc to repair defects;	X	X	
	Criticality - legal rights to perform any necessary work or authorize others to do it	X	(after GPR period)	
	Criticality - authorize competing contractor to modify work, including creating derivative works,	X	(after GPR period)	
	Criticality – qualified talent available during the entire life cycle	X	X	X



Contract Clauses in the RFP or Contract Are Not Enough - CDRs

227.72 - Noncommercial Computer Software and Computer Software Documentation

- 227.7203-3 Policy

- (b) Solicitations and contracts shall—

- Establish **separate contract line items**, to the extent practicable, for the **computer software or computer software documentation to be delivered under** a contract and require offerors and contractors to price separately each deliverable data item



Contract Clauses in the RFP or Contract Are Not Enough – Example CDRL Topics

Some Important CDRLs for software acquisitions include (but are not limited to):

- Source code and source code listings
- Object code listings'
- Algorithms and formulae
- Processes, flow charts, and related material that would enable the software to be reproduced, recreated, or recompiled
- **Licenses**
- Description of Software Architecture, Design, Requirements, and Interfaces
- Software Test Plan
- Test procedures, scripts, cases, and results
- Owners and users manuals
- Installation instructions



Contract Clauses in the RFP or Contract Are Not Enough –Restrictive Markings on Software

Government Purpose Rights

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Sample Source Code Headers

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/// GOVERNMENT PURPOSE RIGHTS

///Rights in Technical Data, computer software & documentation in non-commercial items

///DFARS Clause: 252.227-7013 (f)(2) and 252.227-7014 (f)(2)

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/// are subject to severe criminal and civil penalties. Disseminate in accordance with
/// provisions of DoD Directive 5230.25.

REF: U.S. Navy. Guidebook for Acquisition of Naval Software Intensive Systems. V 1.0. 2008



The Most Important Advice You Can Get

In determining the approach for the acquisition strategy, RFP, and contract, consult:



EARLY AND OFTEN





“Program managers should consider the cost and benefits of acquiring data rights—or consequences of not obtaining them.”

REF: Kove, L. S. The Importance of Data and Data Rights. Defense AT&L: July-August 2007



Summary

- FAR and DFARS provides the policy, definitions, and **contract clauses** to be used in determining and requiring rights to computer software etc.
- Data rights strategies need to be **anticipated at the beginning of the acquisition** effort to avoid surprises.
- Rights to computer software, documentation, and technical data must be incorporated into the **acquisition strategy** and the **RFP**.
- Data rights strategies must take into account **both expected and possible changes in circumstances** throughout the life of the product; cost and schedule impacts of those changes; and tradeoffs that will likely be required.
- Restrictions on computer rights must be reflected in **contract clauses, lists of deliverables, and as markings in/on products themselves**.



References

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- *U.S. Army Source Selection Guide.* May 2008



Contact Information

Charlene Gross

Senior Member Technical Staff

Software Engineering Institute (SEI)

4401 Wilson Blvd

Arlington, VA 22201

cgross@sei.cmu.edu

Office: 703-908-8205



