## Attachment F Requirements

Time and Attendance requirements were prioritized during requirements-gathering sessions attended by State subject matter experts (SMEs). Requirement priority values are defined in this table:

Requirement Level	Printity   Importance to State	
5	Mandatory	Highly critical
4	Mandatory	Somewhat critical
3	Not Mandatory	Important
2	Not Mandatory	Desirable

## The column definitions are:

- Category grouping assigned by the State
- ID sequential number assigned by the State, yellow (1 118) represents functional requirements and blue (119 162) represents technical requirements
- Requirement Description narrative description of requirement
- Mandatory yes means the requirement is mandatory and no means the requirement is optional
- Priority number assigned by the State with 5 being the highest priority and 1 being the lowest priority
- Maximum Score when members of the Proposal Evaluation Committee evaluate the offeror's response to the requirement, this is the highest score that the requirement may receive

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Activity Tracking & Labor Costing	1	The system shall allow default cost center to be derived from tabled criteria (including, but not limited to pay type code) that can be overridden for an individual. Pay code examples include leave, holiday, and term leave.	Yes	5	18
Activity Tracking & Labor Costing	2	The system shall have ability to derive the cost center code in time sheet information based on employee specific data including, but not limited to:  • earnings type (including cash-in, term leave)  • job  • ship  • ship status	Yes	4	12

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Activity Tracking & Labor Costing	3	The system shall have the ability to manually enter cost center codes.	Yes	5	14
Activity Tracking & Labor Costing	4	The system shall have the ability to accept data entry of cost centers that do not yet exist in AKSAS.	Yes	4	12
Activity Tracking & Labor Costing	5	The system shall enable cost centers from AKSAS to be accessible for edit verification.	Yes	4	12
Activity Tracking & Labor Costing	6	The system shall have the ability to restrict the cost centers available to an employee to those that are valid for that employee.	Yes	4	12
Activity Tracking & Labor Costing	7	The system shall allocate time worked to one or more cost centers based on time increments, percent of time, and/or dollar amount.	Yes	5	18
Activity Tracking & Labor Costing	8	The system shall have the ability to allocate specific pay types based on various methods such as:  • percent of hours worked across all cost centers • percent of hours worked across selected cost centers • differentiate between premium pay and regular pay • charge additional straight time and overtime hours to project	Yes	4	12
Activity Tracking & Labor Costing	9	codes in which additional hours were worked  The system shall have the ability to record/allocate time that can be classified as Family Medical Leave Act (FMLA) and Alaska Family Leave Act (AFLA) and include tracking and automatic notifications.	Yes	5	14
Administration	10	The system shall have a single user ID for each user, but shall have the ability to assign multiple roles to the user ID.	Yes	5	14
Administration	11	The system shall have the ability to establish standard "user profiles" from which individual users may inherit privileges.	Yes	5	14
Administration	12	The system shall have the ability to create a user ID with fixed expiration date. For example, for a non-employee, such as a contractor, with a specific start and end date.	No	3	8
Administration	13	The system shall have the ability for automatic notification of security administrator upon disabling log-on capabilities.	No	3	8
Administration	14	The system shall have the ability to disable log-on capabilities if unsuccessful password entry is attempted after a parameter-driven number of unsuccessful attempts.	Yes	4	12

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Administration	15	The system shall provide online inquiry into the security table.	Yes	4	12
Administration	16	The system shall store the employee's Social Security Number and limit the display to selected roles, to comply with State policies regarding sensitive data.	Yes	5	14
Audit	17	The system shall have the ability to maintain database process controls and log all database transactions.	Yes	5	14
Audit	18	The system shall have the ability to log all adds, changes, and deletes to data in the system and have the ability to create an audit report of selected data.	Yes	4	12
Audit	19	The system shall have the ability to specify which data elements will be logged.	Yes	4	12
Audit	20	The system shall include, at a minimum, the following identifiers in logged data:  • user ID  • date/time stamp  • change type  • before/after images of data	Yes	4	12
Audit	21	The system shall provide an audit trail of user access and unauthorized attempts to access the system.	Yes	4	12
Audit	22	The system shall have the ability to recognize and log all system errors and allow the viewing of logs to defined users.	Yes	4	12
Audit	23	The system shall provide an automated audit trail for, and the ability to selectively report on, user-defined transactions, which would log, at a minimum, date, time and user ID.  Examples include additions, changes, deletions, deactivations for all transactions/business events/records, profiles, and source tables.	Yes	5	14
Audit	24	The system shall have the ability to store up to 4 years (3 years plus current year) of audit trail data.	Yes	4	12
Audit	25	The system shall have the ability to maintain active event and security logs for at least 90 days.	Yes	4	12
Audit	26	The system shall have the ability to archive and retrieve event and security logs for at least 180 days.	Yes	4	12

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Authentication	27	The system shall provide the capability for authentication-based access restriction. Examples include but are not limited to:	Yes	5	14
		<ul> <li>applications (including Web Services)</li> <li>screens and tables</li> <li>data elements</li> <li>functions such as add, change, delete and inquiry</li> <li>electronic documents (electronic approvals)</li> </ul>			
Authentication	28	The system shall have the ability to support secure authentications to any LDAP-compliant directory service including, but not limited to: Microsoft Active Directory.	Yes	5	14
Authentication	29	The system shall allow the user to authenticate once to access all functional areas available to that user.	Yes	5	14
Authentication	30	The system shall support the creation and use of alphanumeric passwords of no less than eight characters in length.	Yes	4	12
Authentication	31	The system shall have the ability to use electronic signature on timesheets.	Yes	5	14
Authentication	32	The system shall have the ability to mask password entry so that passwords cannot be viewed while being entered.	Yes	5	14
Edits	33	The system shall, at the conclusion of a unit of work, perform final data validation and edits.	Yes	4	12
Edits	34	The system shall enforce full edit/validation rules for all updates.	Yes	5	14
Edits	35	The system shall display a complete list of error messages for a unit of work (i.e., not only the first error).	Yes	5	14
Edits	36	The system shall allow online corrections to be made to transactions suspended due to validation errors.	Yes	5	14
Edits	37	The system shall provide edits to ensure that timesheet entry is completed and required approvals have been received before submitting to automated payroll processing.	Yes	5	14
Interface	38	The system shall have the ability to interface with external systems that provide validation data.	Yes	5	14
Interface	39	The system shall have the ability to receive user-specified data elements from AKPAY.	Yes	5	14

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Interface	40	The system shall have the ability to populate fields with default values based on business rules or data from external sources. Examples include, but are not limited to: name, bargaining unit, position, overtime eligibility.	Yes	5	14
Interface	41	The system shall be able to send data elements to AKSAS.	Yes	5	14
Interface	42	The system shall have the ability to send data elements to external systems including, but not limited to:  OARS DNR Emergency Firefighters ETS SR system DEC Third-Party Billing System (CRITTS) MMS	Yes	5	20
Interface	43	The system shall allow export and import of data using web services and XML documents. Web services must include the ability to accept time for an employee.	No	3	8
Interface	44	The system shall allow export and import of data using secure HTTP protocol.	Yes	5	14
Pay Rules	45	The system shall have the ability to enter and process a timesheet for a prior pay period.	Yes	5	14
Pay Rules	46	The system shall have the ability to enter and process a timesheet for a future pay period.	Yes	4	12
Pay Rules	47	The system shall have the ability for an employee to record time for multiple positions, whether for concurrently held positions, or as a result of a mid-period transfer.	Yes	5	14
Pay Rules	48	The system shall provide ability to maintain shift information associated with an employee. Examples include but are not limited to: authorization for shift assignment.	Yes	4	12
Pay Rules	49	The system shall have the ability to accept override data in fields that have been pre-populated with values, subject to edits.	Yes	5	14
Pay Rules	50	The system shall have the ability for carry-forward hours (i.e., hours worked in work weeks that are split between pay periods) in order to compare scheduled workweek hours to actual hours worked.	Yes	5	14

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Pay Rules	51	The system shall have the ability to set default pay types, by employee, for multiple work periods in a pay period. Examples include, but are not limited to, regular pay and holiday pay.	Yes	5	14
Pay Rules	52	The system shall have the ability to use specified default cost centers for selected pay types (e.g., leave and holiday) for groups of employees.	Yes	4	12
Pay Rules	53	The system shall have the ability to use multiple rates pay types during a given pay period or day.	Yes	5	14
Pay Rules	54	The system shall have the ability to derive Marine Highways leave pay type and leave hours used based on the:  • last assignment (job, vessel, region)  • years of service  • job code worked most (majority of time: rolling 12-month using job code and ship)	Yes	5	<del>20</del> <u>32</u>
<del>Pay Rules</del>	<del>55</del>	The system shall have the ability to derive the leave pay rate based on:  -bargaining unit -bid assignment -majority of time (rolling 12-month; using job class and ship)	Yes	4	<del>12</del>
Pay Rules	56	The system shall have the ability to automatically generate leave contributions based on contractual obligations for labor union leave banks. For example, leave assessed at initial entry to a bargaining unit or periodically to fund a bank.	No	2	6
Pay Rules	57	The system shall accept equipment code and usage, either hours or mileage; and be capable of passing this data to AKSAS. <u>Usage shall be input as both hours and mileage</u> , and the system shall have the ability to accept one or both.	No	3	8
Pay Rules	58	The system shall have the ability to calculate premium pay types and hours automatically based on employee data and start and stop times entered on employee timesheet. Calculation may require carry-forward from prior pay periods. Examples of premium pay types include, but are not limited to: overtime, shift differential, recall, sea duty, and hazardous duty.	Yes	5	20
Pay Rules	59	The system shall calculate and maintain flexible time credits and compensatory time based on hours worked and other employee data including, but not limited to, bargaining unit.	Yes	5	14

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Reporting	60	The system shall have the ability to generate error/exception reports.	Yes	5	14
Reporting	61	The system shall provide a standard reporting/inquiry library to meet routine reporting and analysis needs.	Yes	4	12
Reporting	62	The system shall have the ability to create reports of employees timesheets.	Yes	5	14
Reporting	63	The system shall have the ability to report and access timesheet history of not less than three years plus current calendar year by employee.	Yes	5	14
Reporting	64	The system shall have the ability for an employee to view the cash value of their leave.	No	2	6
Reporting	65	The system shall have the ability for users to create, request and generate custom reports.	No	3	8
Reporting	66	The system shall have the ability to select any/all data in the system for normal and ad hoc reports.	Yes	5	14
Reporting	67	The system shall have the ability for the user to select specific data elements for report generation.	Yes	5	14
Reporting	68	The system shall have the ability to perform case-insensitive search and select functions.	Yes	4	12
Reporting	69	The system shall have the ability to search and retrieve data, using selection criteria such as pay period, transaction dates, partial or full name, employee identification.	Yes	5	14
Reporting	70	The system shall have the ability to report data elements by line date and available for real-time and batch query.	Yes	5	14
Reporting	71	The system shall have the ability to create reports by user specified time periods; such as fiscal year, calendar year, leave year, or pay period or other specific date ranges.	Yes	5	14
Reporting	72	The system shall have the ability for users to define report layouts with flexible criteria such as sorts, column definition, location, and groupings.	No	2	6
Reporting	73	The system shall have the ability to preview reports before being printed.	Yes	4	12
Reporting	74	The system shall have the ability to print selected sections or pages of an online report.	Yes	4	12

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Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Reporting	75	The system shall have the ability to retain generated reports so they can be reprinted.	No	2	6
Reporting	76	The system shall have the ability to create reports in hardcopy, online, and electronic data files such as CSV, PDF, and text.	Yes	4	12
Reporting	77	The system shall have the ability to electronically distribute report output, such as via email.	Yes	4	12
Reporting	78	The system shall have the ability to store report parameters such as frequency, distribution, and content.	Yes	4	12
Reporting	79	The system shall have the ability for users to specify report distribution parameters online. Examples include, but are not limited to: printer destination, number of copies, and media type (e.g. electronic, paper, portable document format [PDF]).	Yes	4	12
Reporting	80	The system shall have the ability for a user to schedule a report by different frequencies. Examples include but are not limited to: by the time of day, daily, same day weekly.	Yes	4	12
Reporting	81	The system shall have the ability for a user to schedule a report based upon a business calendar.	No	2	6
Reporting	82	The system shall have the ability to create and maintain user defined custom calendars that can be used for scheduling report generation.	No	2	6
Reporting	83	The system shall have the ability to translate coded values into description values for display or report use.	Yes	4	12
Scheduling	84	The system shall provide for workforce scheduling such as staffing 24x7 institutions.	No	2	6
Scheduling	85	The system shall support alternate workweek schedules and part time schedules. Examples include but are not limited to: FLSA workweeks, 14-day work periods, reduced workweek schedules.	Yes	5	14
Time Collection	86	The system shall have the ability to designate each position and groups of positions for exception or positive time reporting.	Yes	4	12
Time Collection	87	The system shall have the ability to record timesheet data using multiple methods. Examples include but are not limited to: employee self-service, electronic timesheet, manual entry, swipe card, time clocks.	Yes	5	14

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Time Collection	88	The system shall have the ability to enter and maintain multiple start and stop dates on records, including, but not limited to, records related to the Family Medical Leave Act and the Alaska Medical Leave Act.	Yes	5	14
Time Collection	89	The system shall have the ability to accept data entry of work period start and stop times in one minute increments and calculate time worked.	Yes	5	14
Time Collection	90	The system shall have the ability to record hours in increments of up to three decimal places.	Yes	4	12
Time Collection	91	The system shall automatically calculate transaction hours based on start and stop times and/or activity type.	Yes	5	14
Time Collection	92	The system shall have the ability to enter time worked and assign each time period to a minimum of 20 cost centers.	Yes	5	14
Time Collection	93	The system shall have the ability to enter activity descriptions via code or free-form text for each segment of time entered.	Yes	4	12
Time Collection	94	The system shall have the ability to enter an amended timesheet and retain a minimum of the original and three amended multiple timesheets for the same pay period.	Yes	5	14
Time Collection	95	The system shall have the ability to enter a timesheet for an employee who has not yet been entered into the payroll system.	Yes	4	12
Time Collection	96	The system shall have the ability for users to choose whether to enter time and attendance data using 24 hour (military time) or AM/PM designation.	Yes	4	12
Time Collection	97	The system shall have the ability to populate timesheets with scheduled hours.	Yes	4	12
Time Collection	98	The system shall have the ability to allow entry of ship code, ship status, job code, and region.	Yes	5	20
Time Collection	99	The system shall have the ability to enter leave requests electronically by the employee.	Yes	4	12
Time Collection	100	The system shall have the ability for employees to donate leave to other employees electronically.	Yes	4	12
Time Collection	101	The system shall have the ability for employees to submit leave cash-in requests.	Yes	4	12

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Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Time Collection	102	The system shall allow the entry of non-time-and-attendance related data, and validation of this data against data from external sources such as APSIN tables or the OARS system.	Yes	4	12
Usability	103	The system shall have the ability for functional users to maintain business rules and generally not require programmer involvement.	Yes	4	12
Usability	104	The system shall have the ability to enter, for free-form text fields larger than 50 characters, at least 1,000 characters.	No	2	6
Usability	105	The system shall provide modifiable archive and purge criteria that can be maintained by functional users and generally not require programmer involvement.	Yes	4	12
Usability	106	The system shall maintain effective dates and original transaction dates and, when applicable, last modified dates for all transactions / documents / business events.	Yes	4	12
Usability	107	The system shall maintain the creation and modification date, time, and user ID for all transactions / documents / business events.	Yes	4	12
Usability	108	The system shall have the ability to enter and store at least 15 digits (including decimals) for all numeric fields where expected value is greater than one thousand.	Yes	4	12
Usability	109	The system shall have the ability to define up to four positions to the right of the decimal for all non-integer numeric fields.	Yes	4	12
Usability	110	The system shall have the ability to specify that a transaction, document or business event entered into the on-line system is reviewable prior to its saving / processing / commitment.	No	3	8
Workflow	111	The system shall include a workflow process, with notification/alert options, for business events and documents.	Yes	4	12
Workflow	112	The system shall have the ability to maintain a hierarchical organizational structure to associate subordinate positions to one or more direct report official or approver positions.	Yes	4	12
Workflow	113	The system shall have the ability to define multiple approval levels for electronic transactions / documents / business events processing.	Yes	4	12
Workflow	114	The system shall permit selected roles to update all data for individual and/or multiple groups of data.	No	3	8

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Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Workflow	115	The system shall, if a submitted electronic document/business event is modified, have the ability to reprocess approvals in accordance with business rules.	Yes	4	12
Workflow	116	The system shall have the ability to override normal workflow processing.	Yes	4	12
Workflow	117	The system shall have the ability to track (for example, identify, record, inquire, report) the progress of electronic transactions / documents / business events.	Yes	4	12
Workflow	118	The system shall have the ability for an employee to enter and/or approve timesheet data using multiple positions. For example, an employee holding a position in more than one department.	Yes	5	14
Continuity	119	The system shall be fully replicated in a location separate from the production environment. The physical location shall be in Anchorage or another location acceptable to the State.	Yes	5	14
Continuity	120	The system shall provide for recovery of individual tables/files within two (2) hours.	No	3	8
Continuity	121	The system shall include disaster recovery with restoration of full functionality within two (2) hours.	Yes	4	12
Continuity	122	The system shall provide for scheduled, automated incremental back-up of all system files with periodic full back-up of the complete system.	Yes	5	14
Continuity	123	The system shall allow incremental backups to occur multiple times per day.	Yes	4	12
Continuity	124	The system shall allow data backup of all operating system data required to allow full recovery.	Yes	5	14
GUI	125	The system shall provide a Graphical User Interface utilizing World Wide Web Consortium (W3C) compliant browser software that is compliant with, at a minimum, the current and immediately previous version of Internet Explorer and Mozilla rendering engine.	Yes	5	14
GUI	126	The system shall provide a consistent look and feel to the graphical user interface to assist in the user's learning and ongoing system use.	Yes	4	12

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
GUI	127	The system shall take advantage of user-friendly features, such as, but not limited to:  • pull-down menus • point and click operation • scroll bars and scrollable list boxes • radio buttons • online prompts or "balloon" help messages • online context sensitive help • find, replace and "go to" features • keyboard equivalents for all menu options • ability to minimize and maximize window	Yes	4	12
GUI	128	The system shall employ colors and other visual and non-visual aids to facilitate the use of system functions. Examples include, but are not limited to, data entry errors presented in red for easy detection.	Yes	4	12
GUI	129	The system shall allow the user to have multiple windows/sessions open simultaneously.	No	3	8
GUI	130	The system shall provide an extensive online error message facility with customizable error message text stored in appropriate system tables.  Examples include, but are not limited to:  short error message description of the error (at least 30 characters)  detailed error message descriptions	Yes	4	12
GUI	131	The system shall have the ability for error messages to contain a link to the online help if applicable.	No	3	8
GUI	132	The system shall provide an online help facility capable of being modified by functional users. Examples include but are not limited to:  • window level help • field level help • error message help • context sensitive help • hypertext linked help • indexed help	Yes	4	12
GUI	133	The system shall provide online ability to drill down from summary information to supporting detail information.	No	2	6

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
GUI	134	The system shall, for free-form text fields, provide an option to automatically insert the date and time of the entry and the user id of the person making the entry.	No	2	6
GUI	135	The system shall include word wrap for free-form text fields.	Yes	4	12
GUI	136	The system shall have the ability for the presentation format of "date" and "time" fields to be user specified.	No	2	6
GUI	137	The system shall have the ability to automatically complete fields based on data as it is being entered (aka "auto-text").	No	2	6
GUI	138	The system shall have the ability to select records or groups of records using flexible selection criteria which includes, but is not limited to: specific key, key ranges, and wild cards.	Yes	4	12
Operation	139	The system shall have the ability to notify and disconnect users when necessary to perform maintenance or other activities that require users to leave the system.	Yes	5	14
Operation	140	The system shall utilize a data dictionary for system data, at the field level, to or from data fields contained in a formatted XML document.	Yes	4	12
Operation	141	The system shall provide for N-tier architecture including, but not limited to: 1) data base, 2) business rules separated from the database design, and 3) graphical user interface presentation logic.	Yes	4	12
Operation	142	The system shall have the ability to integrate with the State's email services including, but not limited to: SMTP and MAPI.	Yes	4	12
Operation	143	The system shall function using a web browser with, at a minimum, a 56K high latency (e.g., satellite with 600ms) connection.	Yes	5	14
Operation	144	The system shall deliver presentation response of, at most, two seconds to at least 95% of screens for users with a TCP/IP connection having greater than 10kb/sec per user bandwidth and less than 50ms sustained latency from the server.	Yes	5	14
Operation	145	The system application processing shall complete 90% of screen transactions within 1/4 second.	Yes	4	12

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Operation	146	The system shall have the ability to establish a time-out limit. For example, terminate a user's session if there is no activity for an established time frame and require the user to re-authenticate before continuing.	Yes	5	14
Operation	147	The system shall have the ability to "lock" records so multiple users cannot perform updates at the same time on the records.	Yes	5	14
Operation	148	The system shall have the ability to relate and/or attach electronic documents to a system record.	Yes	4	12
Security	149	The system shall have the ability to selectively restrict access to the application database(s) from outside the application programs.	Yes	5	14
Security	150	The system shall support delegated security administration. For example, security administration must be available at statewide, department-wide, division, and section levels.	Yes	5	14
Security	151	The system shall provide role-based multi-level security controls.	Yes	5	14
Security	152	The system shall have the ability to manually and automatically suspend all access for a given user; yet maintain security parameter settings for the user in an inactive status so access can be re-activated in the future.	No	3	8
Security	153	The system shall have the ability to support the installation of security patches within three (3) days of patch release and in compliance with State security policies.	Yes	5	14
Security	154	The system shall include either the Cisco Security Agent intrusion prevention tool, or other heuristic-based, "Zero Day," non-signature or port-based, intrusion prevention solution in compliance with State security policies.	Yes	5	14
Security	155	The system shall provide for encrypted storage of selective data.	Yes	5	14
Security	156	The encryption of data for the system shall meet the federal encryption standard, FIPS 140-2.	Yes	5	14
Security	157	The system security tables shall be encrypted and shall not allow for viewing of password information or selected fields.	Yes	4	12

Category	ID	Requirement Description	Mandatory	Priority	Maximum Score
Security	158	The system shall have the ability to utilize encrypted communication when remotely accessing the system via infrastructures that include, but are not limited to: the State's Wide Area Network (WAN) and State agency Local Area Networks (LANs).	Yes	5	14
Technical	159	The system shall provide the full recovery of the last completed unit of work to ensure file/data integrity for all saved transactions.	Yes	5	14
Technical	160	The system shall be available to users 24 hours a day, seven days a week other than scheduled maintenance.	Yes	5	14
Technical	161	The system shall ensure all dates used within the system are Y2K compliant.	Yes	5	14
Technical	162	The system shall provide support for web services standards including, but not limited to: SOAP, UDDI, WSDL, and XML to allow authorized system business functions to be accessed from other web-based applications.	Yes	4	12

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