# Resilient Energy Savings Resource Vault (RESRV)



Updated as of December 2022 SAF/IEE



## Agenda

- Purpose and Objectives
- RESRV Program Overview
  - Program Overview
  - Key Roles and Responsibilities
  - Source of Funds
  - Enterprise Accomplishments
- RESRV Funding
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- RESRV Timeline and Key Deadlines
- Key Contacts
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## Purpose and Objectives

- Provide an overview of RESRV program and key stakeholders.
- 2. Improve understanding of how RESRV savings are **generated** and **captured**.
- 3. Summarize program funding and uses.
- 4. Review program timelines and key deadlines.



## RESRV Program Overview

# The RESRV implements 10 United States Code (U.S.C.) § 2912 for the Department of the Air Force (DAF) Installation Energy.

10 U.S.C. § 2912 and DoD FMR authorize spending,

50% of funds to installation where savings were achieved,

50% of funds to Air Force Enterprise.

RESRV empowers DAF to reinvest energy cost savings back into its bases.



# RESRV Program Accomplishments

# RESRV Accrued ~\$68M of savings over the first three years (FY19-FY21)

- \$62M across 75 Active Duty DAF installations
- \$4.7M across 69 National Guard installations
- \$1.4M across 8 Reserve Command installations

### RESRV Funded ~\$12M Active-Duty Enterprise Projects in FY22

- A new natural gas line and BESS system at Hill AFB
  - Upgrading boilers at JB Elmendorf-Richardson
  - A methane power plant interconnect at Beale AFB
  - A new wastewater plant electric feeder at JBMDL
    - IT cooling system repairs at Patrick SFB
    - Switchgear controls repair at Schriever SFB



## Key Roles and Responsibilities

#### SAF/IEE

 Serves as the principal sponsor of the RESRV program and provides the necessary policy, governance, and oversight.

#### SAF/FMB

- SAF/FM Budget Operations (SAF/FMBO) oversees fiscal best practices concerning the Active Duty RESRV account.
- Transfers necessary funding to and from the RESRV account.

#### **AFIMSC**

- AFIMSC/IZBO coordinates to validate energy consumption reductions to calculate energy cost savings for Active Duty installations.
- AFIMSC/RM oversees RESRV funds once captured, coordinating and tracking the movement of Active Duty funds into and out of the account.

#### AFCEC/CN

- Evaluates and prioritizes identified RESRV projects based on Installation Energy Plans (IEPs).
- Develops justification for project 1-N prioritized Integrated Project List requirements.



## Key Roles and Responsibilities

# ANG Logistics and Installations (A4OC) and AFRC Logistics and Installations (A4CO)

- Provides project prioritization support for both installation and enterprise projects.
- Provides insight into National Guard and Reserve Command energy consumption data.
- Facilitates the RESRV, coordinating and tracking the movement of ANG and AFRC component funds into and out of the accounts.

# National Guard Bureau (NGB) Financial Management/(FM) and AFRC Financial Management (AFRC/FMA)

- Transfers funding to and from the ANG and AFRC RESRV accounts from existing expired funds balances and submits the funding transfer request to SAF/FMB P&FC.
- Has funds control responsibility for both the enterprise and installation ANG and AFRC funds, pending further direction from NGB/A4 or AFRC/A4 for next-level distribution for specific project or program requirements.



### Source of RESRV Funds

#### Energy Consumption

- AEMRR data
- Calculated by:
   AFIMSC/IZBO
   NGB/A4OC
   AFRC/A4CO



# Blended Cost of Energy

- CRIS data
- Calculated by: SAF/FMBOI NGB/FM AFRC/FMA

Final
Calculated
Energy Cost
Savings
(CECS)

#### Two kinds of 'extended availability'

RESRV captures available, expiring funds into an extended availability account.

- FY19-21 program years operated on a 5-year retrospective (capturing FY14 funds in FY19, etc.)
  - 'No-year' extended availability funds
- FY22 onward operate on a 1-year retrospective (i.e., capturing FY21 dollars in FY22)
  - Bound to original year of appropriation and have a 'two-year' (FY+1) maximum for obligation



### RESRV Fund Uses

# 10 USC § 2912 Requires Two Equal and Discrete Funding Categories\*

#### **Enterprise (50%)**

#### Funds may be used for:

- Energy resilience, conservation, security
- Mission assurance
- Weather damage repair, prevention

#### **Project Pipeline:**

- Integrated Priority List (IPL)
- 1-N project list developed by AFCEC/CN based on energy priorities and IEP-identified requirements
- Require adjudication and receive funding pending availability

Installation (50%)

#### Funds may be used for:

- Improvements to existing military family housing
- Unspecified minor construction projects to enhance personnel quality of life
- Any morale, welfare, or recreation facility or service

#### **Project Pipeline:**

- Distributed directly to the installation at which savings were realized
- May be used as determined by the Commanding Officer

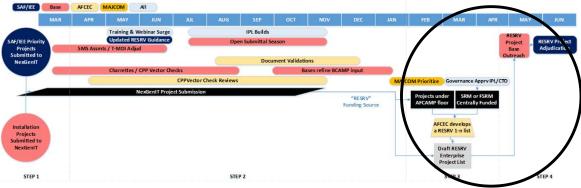
<sup>\*</sup> See Business Rules Table 2 for detailed RESRV Project Characteristics



## Enterprise Project Pipeline

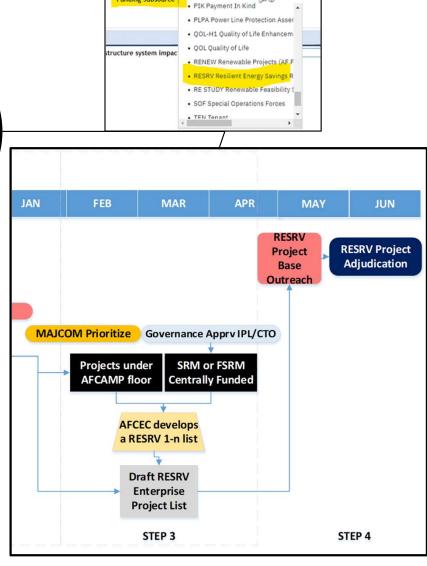
Funding Subsource

#### **AFCAMP IPL Process**



#### **RESRV Project Opportunity Development**

- Projects submitted to AFCAMP IPL may be reviewed for the RESRV.
- Projects may select the RESRV funding type in NexGenIT.
- AFCEC/CN will select projects based on RESRV eligibility and prioritized based on DAF and IEP energy priorities.
- All projects will undergo adjudication.





## Installation Project Pipeline

10 USC § 2912 (b)(2) **One-half** of the amount shall be **used at the installation** at which the savings were realized, **as determined by the Commanding Officer** of such installation consistent with applicable law and regulations, for projects that meet one of the purposes below and other required project characteristics.

- 1. Improvements to existing military housing units
- 2. Any unspecified minor construction project to enhance personnel quality of life.
- 3. Any morale, welfare, or recreation facility or service.





## Funding Characteristics

#### **RESRV Funds:**

#### Shall follow same rules and best practices as normal O&M funds

- Active Duty 3400.5727 O&M Funds
- Air National Guard 3840.5727 O&M Funds
- Air Reserve Command 3740.5727 O&M Funds

# May NOT be combined or supplemented with/by other funding source(s)

- Installation No-Year/Two-Year (must be used at the base they were realized)
- Enterprise No-Year/Two-Year

Use must be reported to SAF/IEE for annual Congressional report.

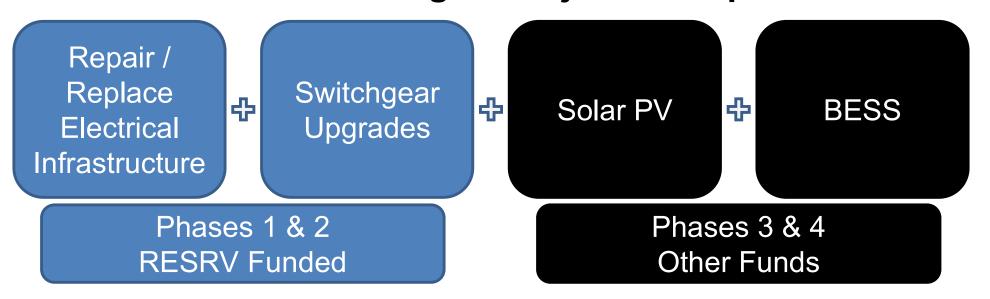


# Funding Characteristics: Phased Project Hypothetical

RESRV funds may be applied to complete and useful phases

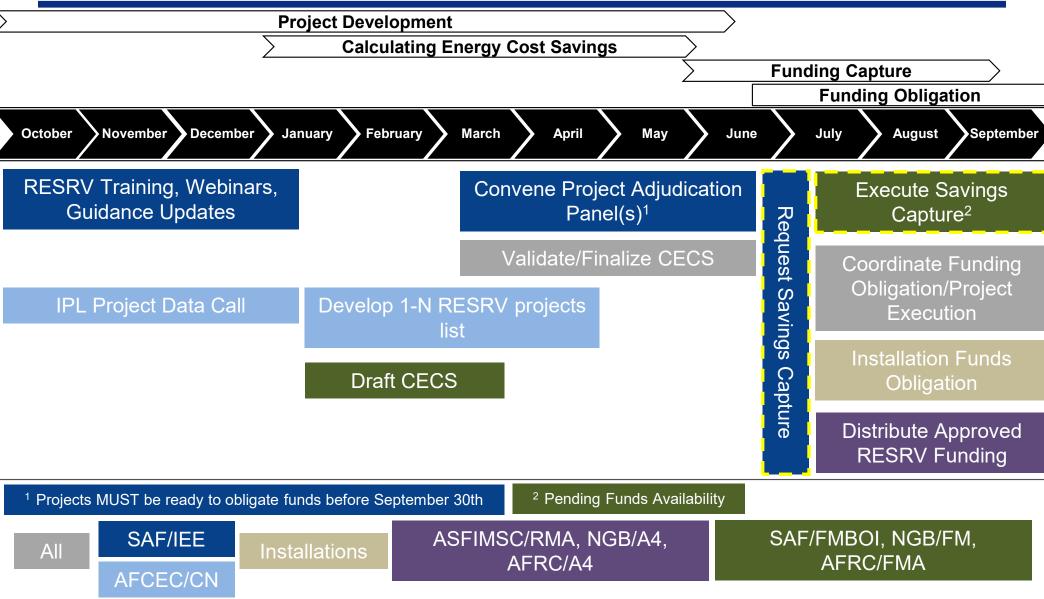
- Overcome RESRV funding limitations
- Work around non-O&M components
  - Navigate timeline challenges
  - Multiply RESRV funds impact

#### **Phased Microgrid Project Example:**



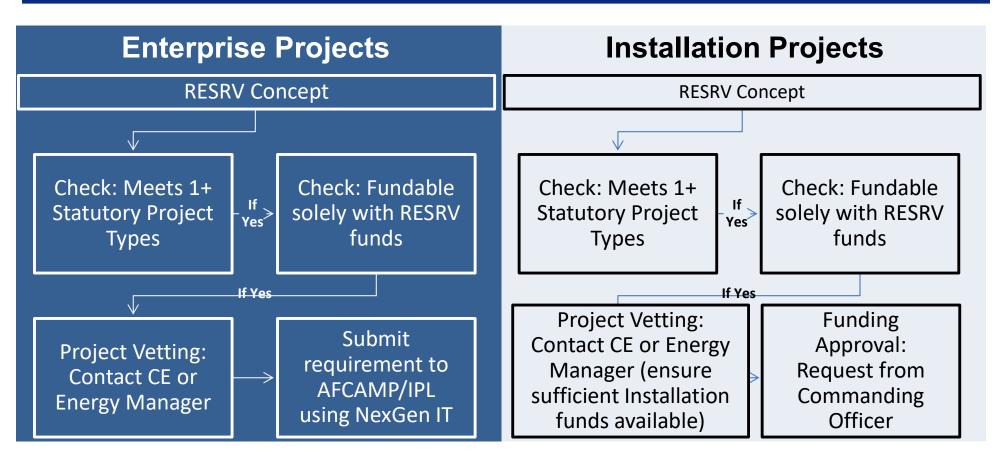


# Annual RESRV Program Timeline





### **Key Initial Contacts**



For copies of this presentation or more information visit SAF/IEE RESRV Site @

**RESRV Resources Page** 



## **Questions and Answers**



## 10 U.S.C. § 2912

- (a) Availability.—An amount of the funds appropriated to the Department of Defense for a fiscal year that is equal to the amount of energy cost savings realized by the Department, including financial benefits resulting from shared energy savings contracts entered into under section 2913 of this title, and, in the case of operational energy, from both training and operational missions, shall remain available for obligation under subsection (b) or (c), as the case may be, for that fiscal year and the succeeding fiscal year, without additional authorization or appropriation.

  (b) Use.—Except as provided in subsection (c) with respect to operational energy cost savings, the Secretary of Defense shall provide that the amount that remains available for obligation under subsection (a) and the funds made available under section 2916(b)(2) of this title shall be used as follows:
  - (1) One-half of the amount shall be used for the implementation of additional energy resilience, mission assurance, weather damage repair and prevention, energy conservation, and energy security measures, including energy resilience and energy conservation construction projects, at buildings, facilities, or installations of the Department of Defense or related to vehicles and equipment of the Department, which are designated, in accordance with regulations prescribed by the Secretary of Defense, by the head of the department, agency, or instrumentality that realized the savings referred to in subsection (a).
  - (2) One-half of the amount shall be used at the installation at which the savings were realized, as determined by the commanding officer of such installation consistent with applicable law and regulations, for—
    - (A) improvements to existing military family housing units;
    - (B) any unspecified minor construction project that will enhance the quality of life of personnel; or
    - (C) any morale, welfare, or recreation facility or service.
- (c) Use of Operational Energy Cost Savings.—The amount that remains available for obligation under subsection (a) that relates to operational energy cost savings realized by the Department shall be used for the implementation of additional operational energy resilience, efficiencies, mission assurance, energy conservation, or energy security within the department, agency, or instrumentality that realized that savings.
- (d) Treatment of Certain Financial Incentives.—Financial incentives received from gas or electric utilities under section 2913 of this title shall be credited to an appropriation designated by the Secretary of Defense. Amounts so credited shall be merged with the appropriation to which credited and shall be available for the same purposes and the same period as the appropriation with which merged.

#### (e)Transfer of Amounts.—

- (1) The Secretary of Defense may transfer amounts described in subsection (a) that remain available for obligation to other funding accounts of the Department of Defense if the purpose for which such amounts will be used is a purpose specified in subsection (b) or (c).
- (2) Amounts transferred to a funding account of the Department under paragraph (1) shall be available for obligation for the same period as amounts in that account.
- (3) At the end of each fiscal year, the Secretary of Defense shall submit to Congress a report detailing any funds transferred pursuant to paragraph (1) during that fiscal year, including a detailed description of the purpose for which such amounts have been used.



# Installation Relevant 10 USC § 2912 Language

#### 10 USC § 2912

- "(b) Use.—Except as provided in subsection (c) with respect to operational energy cost savings, the Secretary of Defense shall provide that the amount that remains available for obligation under subsection (a) and the funds made available under section 2916(b)(2) of this title shall be used as follows:
  - (1) ~{One-half of the amount will be used for enterprise projects}~
  - (2) One-half of the amount shall be used at the installation at which the savings were realized, as determined by the commanding officer of such installation consistent with applicable law and regulations, for—
    - (A) improvements to existing military family housing units;
    - (B) any unspecified minor construction project that will enhance the quality of life of personnel; or
    - (C) any morale, welfare, or recreation facility or service.
- (c) Use of Operational Energy Cost Savings.—The amount that remains available for obligation under subsection (a) that relates to operational energy cost savings realized by the Department shall be used for the implementation of additional operational energy resilience, efficiencies, mission assurance, energy conservation, or energy security within the department, agency, or instrumentality that realized that savings."



# RESRV Active Duty No-Year Funds Available by Base

Installation Name	Total Calculated Energy Cost Savings	Installation 50 Percent	Installation Name	Total Calculated Energy Cost Savings	Installation 50 Percent
JOINT BASE ELMENDORF-RICHARDSON	\$4,657,986	\$2,328,993	DOVER AIR FORCE BASE	\$489,252	\$244,626
PETERSON AIR FORCE BASE	\$3,567,564	\$1,783,782	INCIRLIK AIR BASE ADANA	\$412,501	\$206,250
RAMSTEIN AIR BASE	\$3,051,461	\$1,525,731	MISAWA AIR BASE	\$407,435	\$203,717
JOINT BASE SAN ANTONIO	\$2,858,220	\$1,429,110	CHARLESTON AIR FORCE BASE	\$396,313	\$198,157
HANSCOM AIR FORCE BASE	\$2,758,776	\$1,379,388	MALMSTROM AIR FORCE BASE	\$372,646	\$186,323
YOKOTA AIR BASE	\$2,312,555	\$1,156,278	LITTLE ROCK AIR FORCE BASE	\$339,682	\$169,841
OSAN AIR BASE	\$2,221,978	\$1,110,989	FAIRCHILD AIR FORCE BASE	\$338,173	\$169,086
RAF LAKENHEATH	\$2,006,866	\$1,003,433	INCIRLIK AIR BASE	\$332,700	\$166,350
MCGUIRE AIR FORCE BASE	\$1,821,524	\$910,762	TYNDALL AIR FORCE BASE	\$323,421	\$161,711
LANGLEY AIR FORCE BASE	\$1,812,203	\$906,102	SEYMOUR JOHNSON AIR FORCE BASE	\$320,446	\$160,223
EGLIN AIR FORCE BASE	\$1,778,717	\$889,358	SCHRIEVER AIR FORCE BASE	\$290,392	\$145,196
WRIGHT PATTERSON AIR FORCE BASE	\$1,753,581	\$876,790	GOODFELLOW AIR FORCE BASE	\$277,074	\$138,537
RAF MILDENHALL	\$1,593,056	\$796,528	KEESLER AIR FORCE BASE	\$261,178	\$130,589
AVIANO AIR BASE	\$1,559,819	\$779,910	MOUNTAIN HOME AIR FORCE BASE	\$257,845	\$128,922
GRAND FORKS AIR FORCE BASE	\$1,558,249	\$779,125	BEALE AIR FORCE BASE	\$254,097	\$127,048
FRANCIS E WARREN AIR FORCE BASE	\$1,450,036	\$725,018	LAUGHLIN AIR FORCE BASE	\$245,199	\$122,600
SPANGDAHLEM AIR BASE	\$1,351,598	\$675,799	ALTUS AIR FORCE BASE	\$219,212	\$109,606
SHAW AIR FORCE BASE	\$1,161,082	\$580,541	KADENA AIR BASE	\$219,016	\$109,508
WHITEMAN AIR FORCE BASE	\$1,135,491	\$567,746	SCOTT AIR FORCE BASE	\$194,948	\$97,474
LAJES FIELD	\$1,075,294	\$537,647	USAF ACADEMY	\$181,848	\$90,924
MCCONNELL AIR FORCE BASE	\$1,059,380	\$529,690	RAF ALCONBURY	\$177,383	\$88,691
SHEPPARD AIR FORCE BASE	\$1,042,349	\$521,175	BUCKLEY AIR FORCE BASE	\$163,666	\$81,833
EARECKSON AIR STATION	\$828,252	\$414,126	RAF FAIRFORD	\$161,777	\$80,889
MACDILL AIR FORCE BASE	\$802,934	\$401,467	NELLIS AIR FORCE BASE	\$161,265	\$80,632
EIELSON AIR FORCE BASE	\$792,150	\$396,075	JOINT BASE ANDREWS-NAVAL AIR FACILITY WASHINGTON	\$158,326	\$79,163
MAXWELL AIR FORCE BASE	\$724,680	\$362,340	KIRTLAND AIR FORCE BASE	\$147,397	\$73,698
EDWARDS AIR FORCE BASE	\$721,659	\$360,830	TINKER AIR FORCE BASE	\$140,445	\$70,222
OFFUTT AIR FORCE BASE	\$693,074	\$346,537	VANCE AIR FORCE BASE	\$130,648	\$65,324
DAVIS-MONTHAN AIR FORCE BASE	\$671,908	\$335,954	MOODY AIR FORCE BASE	\$120,354	\$60,177
HOLLOMAN AIR FORCE BASE	\$619,085	\$309,542	DYESS AIR FORCE BASE	\$111,345	\$55,673
COLUMBUS AIR FORCE BASE	\$606,077	\$303,039	DAVIS MONTHAN AIR FORCE BASE	\$91,322	\$45,661
MINOT AIR FORCE BASE	\$601,240	\$300,620	HURLBURT FIELD	\$73,172	\$36,586
VANDENBERG AIR FORCE BASE	\$598,774	\$299,387	LOS ANGELES AIR FORCE BASE	\$54,146	\$27,073
RAF CROUGHTON	\$590,799	\$295,400	BARKSDALE AIR FORCE BASE	\$52,696	\$26,348
PATRICK AIR FORCE BASE	\$589,873	\$294,937	LUKE AIR FORCE BASE	\$37,409	\$18,704
KUNSAN AIR BASE	\$585,841	\$292,921	MORON AIR BASE	\$1,827	\$913
ELLSWORTH AIR FORCE BASE	\$561,727	\$280,864	TRAVIS AIR FORCE BASE	\$243	\$121
ROBINS AIR FORCE BASE	\$491,079	\$245,540			



# RESRV National Guard No-Year Funds Available by Base

Installation Name	Total Calculated Energy Cost Savings	Installation 50 Percent	Installation Name
BANGOR INTERNATIONAL AIRPORT	\$236,527	\$118,263	KEY FIELD
BARNES MUNICIPAL AIRPORT	\$225,441	\$112,721	SCHENECTADY COUNTY AIRPORT
SELFRIDGE ANG BASE	\$170,196	\$85,098	FORT WAYNE INTERNATIONAL AIRPORT
QUONSET STATE AIRPORT	\$169,770	\$84,885	LOUISVILLE IAP - STANDIFORD FIELD
MCCONNELL AIR FORCE BASE (ANG)	\$168,452	\$84,226	OTIS AIR NATIONAL GUARD BASE
HICKAM AIR FORCE BASE (ANG)	\$159,386	\$79,693	MOFFETT FLD RENO TAHOE INTERNATIONAL AIRPORT
BRADLEY INTERNATIONAL AIRPORT			CARSWELL AIR RESERVE STATION
	\$154,117	\$77,059	MINNEAPOLIS-ST PAUL IAP
NASHVILLE INTERNATIONAL AIRPORT	\$151,711	\$75,855	HULMAN REGIONAL AIRPORT
FORBES FIELD	\$137,389	\$68,695	ROSECRANS MEMORIAL AIRPORT
MCGHEE TYSON AIRPORT	\$132,955	\$66,478	HORSHAM AIR GUARD STATION (WILLOW G
HARRISBURG IAP	\$131,496	\$65,748	MANSFIELD LAHM AIRPORT
TOLEDO EXPRESS AIRPORT	\$129,511	\$64,756	JACKSON IAP/THOMPSON FIELD
FRANCIS S GABRESKI AIRPORT	\$121,179	\$60,590	YEAGER AIRPORT
LAMBERT ST LOUIS IAP	\$120,634	\$60,317	NEW ORLEANS NAS (ANG)
MARTIN STATE AIRPORT	\$120,624	\$60,312	GREAT FALLS IAP
STEWART INTERNATIONAL AIRPORT	\$113,900	\$56,950	MONTGOMERY RAP/DANNELLY FLD SIOUX GATEWAY AP/COL BUD DAY FIELI
KELLY FIELD ANNEX	\$112,373	\$56,187	PITTSBURGH INTERNATIONAL AIRPORT
CHARLOTTE/DOUGLAS INT AIRPORT	\$110,453	\$55,226	HECTOR INTERNATIONAL AIRPORT
LITTLE ROCK AIR FORCE BASE (ANG)		\$54,434	CAMP PENDLETON MILITARY RESERVATION
	\$108,867		BIRMINGHAM INTERNATIONAL AIRPOR
VOLK FIELD	\$101,394	\$50,697	TUCSON INTERNATIONAL AIRPORT
MCGUIRE AIR FORCE BASE (ANG)	\$91,165	\$45,582	GENERAL WAYNE A. DOWNING PEORIA I
SPRINGFIELD BECKLEY MUNICIPAL AIRPORT	\$89,476	\$44,738	TULSA INTERNATIONAL AIRPORT
CHEYENNE REGIONAL AIRPORT	\$88,578	\$44,289	EIELSON AIR FORCE BASE (ANG)
DANE COUNTY REGIONAL AIRPORT-TRUAX FIELD	\$86,008	\$43,004	WILL ROGERS WORLD AIRPORT
ABRAHAM LINCOLN CAPITAL AIRPORT	\$85,307	\$42,654	SKY HARBOR INTERNATIONAL AIRPORT
EWVRA SHEPHERD FIELD	\$74,822	\$37,411	DES MOINES INTERNATIONAL AIRPORT HANCOCK FIELD/SYRACUSE IAP
SAVANNAH/HILTON HEAD IAP	\$74,707	\$37,353	CAMP MURRAY ANG STATION
GENERAL MITCHELL INTERNATIONAL APT	\$72,214	\$36,107	JOE FOSS FIELD
BURLINGTON INTERNATIONAL AIRPORT	\$68,787	\$34,393	AIR NATIONAL GUARD READINESS CENTER (A
W K KELLOGG AIRPORT	\$67,193	\$33,597	KIRTLAND AIR FORCE BASE (ANG)
MCENTIRE JOINT NATIONAL GUARD BASE	\$65,854	\$32,927	JEFFERSON BARRACKS ANG STATION (See Lar
ATLANTIC CITY INTERNATIONAL AIRPORT			JACKSONVILLE IAP
NEW CASTLE COUNTY AIRPORT	\$65,322	\$32,661	FT INDIANTOWN GAP ANG STATION (See Harr
	\$64,169	\$32,085	FRESNO YOSEMITE INTERNATIONAL
DULUTH INTERNATIONAL AIRPORT	\$56,792	\$28,396	CAMP PERRY ANG STATION (see Mansfield L

Installation Name	Total Calculated Energy	Installation 50
	Cost Savings	Percent
KEY FIELD	\$55,782	\$27,891
SCHENECTADY COUNTY AIRPORT	\$46,363	\$23,182
FORT WAYNE INTERNATIONAL AIRPORT	\$45,457	\$22,728
LOUISVILLE IAP - STANDIFORD FIELD	\$44,372	\$22,186
OTIS AIR NATIONAL GUARD BASE	\$42,708	\$21,354
MOFFETT FLD	\$40,948	\$20,474
RENO TAHOE INTERNATIONAL AIRPORT	\$39,201	\$19,600
CARSWELL AIR RESERVE STATION	\$38,272	\$19,136
MINNEAPOLIS-ST PAUL IAP	\$35,253	\$17,627
HULMAN REGIONAL AIRPORT	\$34,950	\$17,475
ROSECRANS MEMORIAL AIRPORT	\$32,884	\$16,442
HORSHAM AIR GUARD STATION (WILLOW GROVE)	\$32,299	\$16,150
MANSFIELD LAHM AIRPORT	\$29,783	\$14,892
JACKSON IAP/THOMPSON FIELD	\$27,951	\$13,976
YEAGER AIRPORT	\$24,863	\$12,432
NEW ORLEANS NAS (ANG)	\$24,109	\$12,055
GREAT FALLS IAP	\$23,786	\$11,893
MONTGOMERY RAP/DANNELLY FLD	\$21,459	\$10,730
SIOUX GATEWAY AP/COL BUD DAY FIELD	\$20,308	\$10,154
PITTSBURGH INTERNATIONAL AIRPORT	\$19,928	\$9,964
HECTOR INTERNATIONAL AIRPORT	\$19,855	\$9,927
CAMP PENDLETON MILITARY RESERVATION (ANG)	\$14,802	\$7,401
BIRMINGHAM INTERNATIONAL AIRPORT	\$14,170	\$7,085
TUCSON INTERNATIONAL AIRPORT	\$12,633	\$6,316
GENERAL WAYNE A. DOWNING PEORIA IAP	\$12,153	\$6,076
TULSA INTERNATIONAL AIRPORT	\$10,394	\$5,197
EIELSON AIR FORCE BASE (ANG)	\$8,811	\$4 <i>,</i> 405
WILL ROGERS WORLD AIRPORT	\$8,025	\$4,012
SKY HARBOR INTERNATIONAL AIRPORT	\$7,730	\$3,865
DES MOINES INTERNATIONAL AIRPORT	\$2,966	\$1,483
HANCOCK FIELD/SYRACUSE IAP	\$2,784	\$1,392
CAMP MURRAY ANG STATION	\$2,616	\$1,308
JOE FOSS FIELD	\$1,829	\$915
AIR NATIONAL GUARD READINESS CENTER (ANGRC)	\$307	\$153
KIRTLAND AIR FORCE BASE (ANG)	\$252	\$126
JEFFERSON BARRACKS ANG STATION (See Lambert)	\$0	\$0
JACKSONVILLE IAP	\$0	\$0
FT INDIANTOWN GAP ANG STATION (See Harrisburg)	\$0	\$0
FRESNO YOSEMITE INTERNATIONAL	\$0	\$0
CAMP PERRY ANG STATION (see Mansfield Lahm)	\$0	\$0



# RESRV Reserve Command No-Year Funds Available by Base

Installation Name	Total Calculated Energy Cost Savings	Installation 50 Percent
WESTOVER AIR RESERVE BASE	\$395,916	\$197,958
DOBBINS AIR RESERVE BASE	\$268,058	\$134,029
GRISSOM AIR RESERVE BASE	\$250,446	\$125,223
YOUNGSTOWN-WARREN REGIONAL AIRPORT ARS	\$192,190	\$96,095
NIAGARA FALLS IAP-AIR RESERVE STATION	\$131,782	\$65,891
PITTSBURGH IAP-AIR RESERVE STN	\$69,452	\$34,726
MINNEAPOLIS-ST PAUL IAP-AIR RESERVE STN	\$67,266	\$33,633
MARCH AIR RESERVE BASE	\$59,212	\$29,606