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NATIONAL SECURITY AGENCY  
WASHINGTON 25, D. C.

Serial: 000549-S  
17 Dec 54

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SUBJECT: Report of Communications Security Violations

TO: Commander  
U. S. Air Force Security Service  
San Antonio, Texas

1. Attached is the quarterly (July through September 1954) compilation of communications security violations reported to or noted by this Agency which occurred in communications of those Air Force stations which handle COMINT traffic. You have been notified of completed evaluations of possible compromises which are reported herein as violations.

2. This report is furnished primarily for guidance in improving the security of COMINT communications. Similar reports are forwarded to Chief, Army Security Agency, and Chief of Naval Operations. Upon request, additional copies of this report will be provided in sufficient quantity for dissemination to those activities under your Command engaged in COMINT operations.

3. Extracts from this quarterly summary may be classified SECRET if the extracts are restricted to lists of violations which involve messages classified no higher than SECRET. For example, the list of violations committed by an activity which originates messages classified no higher than SECRET may be extracted and forwarded to that activity as SECRET material. The key list is SECRET in classification.

4. This correspondence may be downgraded to SECRET upon removal of Inclosure 1.

FOR THE DIRECTOR:

*GEO. E. CAMPBELL*  
GEO. E. CAMPBELL  
COLONEL, AGC  
ADJUTANT GENERAL

Declassified and approved for release by NSA on 05-15-2014 pursuant to E.O. 13526

2 Incls:

1. Communications Security Violations by Air Force Stations.
2. Key List of Air Force Violations.


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cc:

NSA Europe  
 NSA United Kingdom  
 NSA Far East  
 NSA Alaska  
 NSA Pacific  
 AG  
 C/S  
 COMSEC (3)  
 S/ASST ←   
 COM  
 PROD  
 O6B  
 411  
 412  
 413

M/R: This is a compilation of communications security violations committed by Air Force stations during July, August, and September 1954. A similar report will be forwarded to Chief, ASA, and CNO. USAFSS furnished 10 copies.

*J. V. Kelly*  
 J. V. Kelly, 4731-2, 60454/pa

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COMMUNICATIONS SECURITY VIOLATIONS BY AIR FORCE STATIONS

<u>DTG</u>	<u>TRIGRAPH</u>	<u>KEY NO.</u>	<u>REMARKS</u>
			<u>USA-33</u>
			<u>JULY</u>
030002Z	AEF	1	Fifth rotor <u>straight</u> rather than reversed
030045Z	AEB	1	Fifth rotor straight rather than reversed
070020Z		4a	Broke on ADYRI vice ADRYI
151615Z	AXC	4c	Broke on KHRDO vice KHRZO
			<u>AUGUST</u>
260005Z	BHP	8	Broke using trigraph BKP
			<u>SEPTEMBER</u>
031515Z	APC	14	Fourth rotor failed at counter reading 0280
041205Z	BFN	4d	Broke on DLJNB vice DLJNN
210610Z		14	Fourth rotor failed
			<u>USA-34</u>
			<u>SEPTEMBER</u>
091855Z		12	Key tape stuck
120800Z		12	Key tape stuck
			<u>USA-34B</u>
			<u>AUGUST</u>
162230Z		11	Keyboard operation
			<u>USA-38</u>
			<u>JULY</u>
070150Z	BRT	8	Broke using trigraph BJT
200128Z	DXC	4b	Broke on DYWBB vice DXWBB
200128Z	DXF	4d	Broke on FFMKH vice KFWKH
			<u>AUGUST</u>
092315Z	BHR	4d	Broke on XRFNS vice XRFNV

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VIOLATIONS (Cont'd)

DTG            TRIGRAPH            KEY NO.            REMARKS

USA-38 (Cont'd)

AUGUST (Cont'd)

250107Z	CST	4d	Broke on JHJFN vice UHJFN
290015Z	DNY	4b	Broke on ZDNEG vice ZDNEF

SEPTEMBER

041920Z	AVU	4d	Broke on KGTAL vice AXTAL
100245Z		11	Keyboard operation
230045Z	DHA	4d	Broke on HMNXN vice HMNXS
240050Z	DLI	4d	Broke on MARLA vice MARD A
301300Z	EFX	3	Used key list assigned to USA-38B
301300Z	EFU	3	Used key list assigned to USA-38B
301555Z	EGA	3	Used key list assigned to USA-38B
301555Z		3	Used key list assigned to USA-38B
301930Z		3	Used key list assigned to USA-38B

USA-38B

JULY

020115Z	ARL	8	Broke using trigraph AJL
100256Z	CVI	4c	Broke on ARTNY vice ARENY
271205Z	ILZ	2	Broke on AM rotor arrangement
271206Z	IMC	2	Broke on AM rotor arrangement
271429Z	IMG	2	Broke on AM rotor arrangement
271516Z		2	Broke on AM rotor arrangement
271550Z		2	Broke on AM rotor arrangement
271555Z		2	Broke on AM rotor arrangement
271605Z		2	Broke on AM rotor arrangement
271645Z		2	Broke on AM rotor arrangement
271759Z	INX	4d	Broke on BNPYQ vice BNPYG
301515Z	JXZ	4d	Broke on HZANK vice HZANG

AUGUST

141950Z		12	Key tape stuck
240204Z	INX	4d	Broke on DIMFV vice DIMXU

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VIOLATIONS (Cont 'd)

<u>DTG</u>	<u>TRIGRAPH</u>	<u>KEY NO.</u>	<u>REMARKS</u>
<u>USA-51</u>			
<u>JULY</u>			
081048Z		13	Use of incorrect Top Secret Codeword
290001Z	CQK	8	Broke using trigraph CUK
<u>AUGUST</u>			
101015Z		2	Broke on PM rotor arrangement
120355Z		11	Keyboard operation
161954Z		11	Keyboard operation
<u>SEPTEMBER</u>			
030400Z	BCI	14	Random rotor failed at counter reading 1458
072030Z		11	Keyboard operation
<u>USA-53</u>			
<u>JULY</u>			
280045Z	CLK	4c	Broke on XBWVB vice XBWVG
<u>AUGUST</u>			
022340Z	ACR	1	Third rotor straight rather than reversed
022340Z	ACS	1	Third rotor straight rather than reversed
022340Z	ACT	1	Third rotor straight rather than reversed
022340Z	ACX	1	Third rotor straight rather than reversed
132153Z	BFZ	4	Broke on PDCJU vice PDCJH
240400Z	BGG	4a	Broke on JPQFR vice JPFQR
<u>SEPTEMBER</u>			
071055Z		2	Broke on PM rotor arrangement
210015Z	CFC	4d	Broke on FKZIU vice FKZIH
251235Z		14	Bump rotor failed

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VIOLATIONS (Cont 'd)

<u>DTG</u>	<u>TRIGRAPH</u>	<u>KEY NO.</u>	<u>REMARKS</u>
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USA-54

JULY

050420Z	AZW	4d	Broke on QKTRY vice QKLRY
061630Z	BMQ	4b	Broke on RYFMV vice QYFMV
120830Z	CSW	4d	Broke on HRHOE vice HRHON
210150Z	EJP	4d	Broke on JPGIY vice JPRIK
251335Z	FJJ	4d	Broke on KLJLW vice KLJLZ
271450Z	FUY	4d	Broke on HIUMC vice HIUMA
291245Z	GII	2	Broke on AM rotor arrangement

AUGUST

011000Z	ACT	4b	Broke on QWASI vice QXASI
041208Z	AVD	4d	Broke on NIUJX vice NIUJK
201205Z	EAZ	4d	Broke on FNDUF vice FNAUF
280735Z	AJI	4b	Broke on WLQKK vice VIQKK

SEPTEMBER

082035Z	CSY	4a	Broke on CKQUE vice CKQEU
131400Z	EEG	4d	Broke on SDIAK vice SDIAF
200550Z	FKA	4d	Broke on SGTKR vice SGTKP
200550Z	FRL	4b	Broke on JUZIB vice JVZIB
231905Z	GHN	4d	Broke on MEKZP vice WEKZP

USA-54A

JULY

011430Z	A?K	4a	Broke on KDXNI vice KDNXI
020235Z	APG	4b	Broke on XNYDE vice XOYDE
050015Z	BKQ	10	Message indicator derived using deciphering procedure
080110Z	CIO	2	Broke on 7 July PM rotor arrangement
080930Z	CMA	4d	Broke on OKIDC vice OUIDC
100525Z	DDV	4d	Broke on OEVDH vice DEVDH
131125Z	DVQ	4d	Broke on VYLUQ vice VYLEQ
161310Z	EPC	10	Message indicator derived using deciphering procedure
180350Z	EYX	4d	Broke on RDQKJ vice PDQKJ
202056Z	GRR	4b	Broke on HLEXV vice HLEXU



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VIOLATIONS (Cont'd)

<u>DTG</u>	<u>TRIGRAPH</u>	<u>KEY NO.</u>	<u>REMARKS</u>
<u>USA-54A (Cont'd)</u>			
<u>JULY (Cont'd)</u>			
202056Z	GGX	6	Omitted traffic type designator
270302Z	HZX	4d	Broke on EKUBG vice EKEBG
280730Z	IGY	4d	Broke on TGPQK vice TQPQK
290915Z	IRV	4a	Broke on CAEPN vice CEAPN

AUGUST

090535Z	DAL	4d	Broke on VFBOX vice VFBOJ
112345Z	DPN	4c	Broke on PYIFE vice VYIFE
120430Z	DQI	5	Broke on CBTZS vice COTZS
162222Z	ENJ	4d	Broke on UKUYX vice DKREX
162352Z	EOS	4d	Broke on DVRGQ vice DVRGZ
280045Z	GVL	4d	Broke on RUBPH vice ROEPH

SEPTEMBER

032250Z	AQP	14	Random rotor failed
291240Z	EUT	4a	Broke on XJOAK vice XJAOK
011245Z		3	Used key list assigned to USA-54
011320Z		3	Used key list assigned to USA-54
012345Z		3	Used key list assigned to USA-54
011405Z		3	Used key list assigned to USA-54

USA-54C

JULY

080315Z	BCD	4d	Broke on PDRAT vice PDRPU
160515Z	CNC	10	Message indicator derived using deciphering procedure
161335Z	CPC	4d	Broke on ZGNZL vice ZGNZS
161640Z	CPZ	4a	Broke on RLCYC vice IRCYC
170228Z	CRI	4d	Broke on NDJSK vice NDJST
230415Z	DZI	4d	Broke on VOHTF vice VONTF

AUGUST

100700Z	BTS	4d	Broke on KMJYR vice KMJVR
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VIOLATIONS (Cont'd)

<u>DIG</u>	<u>TRIGRAPH</u>	<u>KEY NO.</u>	<u>REMARKS</u>
<u>USA-55</u>			
<u>JULY</u>			
070105Z	ANY	4c	Broke on ZTAQU vice ZTAUU
070105Z	AQG	4b	Broke on CXNVQ vice DXNVQ
142115Z	BGJ	4d	Broke on YLPOH vice YHPOH
202320Z	CCQ	4d	Broke on KAAXS vice KEAXS
270057Z	CNR	4b	Broke on PRSDX vice PRSDW
270428Z	COW	7	KIMXD
302126Z	CVG	4d	Broke on BMDV vice PMDV
<u>AUGUST</u>			
040050Z	ADW	4c	Broke on YDOTG vice YDOTD
052221Z	AIM	4d	Broke on ZPDIO vice ZMIPX
062130Z	ARV	4c	Broke on KPGKC vice KPGKZ
102140Z	AWM	4d	Broke on XEEMQ vice MEEMQ
290050Z	DND	4d	Broke on NFUYZ vice NFDYZ
<u>SEPTEMBER</u>			
050050Z	ARP	4c	Broke on PAMES vice PAMBS
160026Z		14	Fourth rotor failed
180755Z	BYX	4d	Broke on HQZFR vice HQZFY
<u>USA-56</u>			
<u>JULY</u>			
200906Z	FNW	6	Omitted traffic type designator
<u>SEPTEMBER</u>			
230720Z	DWH	4c	Broke on CCSCA vice CGSCA
261300Z		15	Correct DIG 260724Z
261535Z		3	Used key list assigned to 6910th Scty Gp

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<u>DTG</u>	<u>TRIGRAPH</u>	<u>KEY NO.</u>	<u>REMARKS</u>
<u>USA-56A</u>			
<u>JULY</u>			
301240Z		3	Used key list assigned to 6910th Scty Gp
301425Z		3	Used key list assigned to 6910th Scty Gp
302240Z		3	Used key list assigned to 6910th Scty Gp

AUGUST

060130Z		9a	Broke on AA vice EE
200620Z		2	Broke on rotor arrangement for 21 Aug
231005Z		2	Broke on PM rotor arrangement

USA-57JULY

030945Z	EIT	4d	Broke on WFTOR vice SFTOR
070510Z	D&D	4d	Broke on UGYWN vice UGYWI
182245Z		9a	Broke on BB vice AA
301620Z	KAK	4b	Broke on KCOF vice KCBOF

AUGUST

111145Z	DZY	2	Broke on PM rotor arrangement
212030Z	IDS	4d	Broke on DIFVQ vice DPFVQ
260045Z	JNR	4d	Broke on OBZJQ vice IEZJQ

SEPTEMBER

111720Z	CJH	4d	Broke on USCJT vice USFJT
161820Z	DIM	8	Broke using trigraph DIV
180025Z		14	Fourth rotor failed
212112Z	EIN	4d	Broke on LWRHG vice IWRHG
250425Z	FJO	4d	Broke on ROLLI vice ROLLR
252015Z	FMZ	4d	Broke on QUYTC vice QUITC

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VIOLATIONS (Cont'd)

<u>DTG</u>	<u>TRIGRAPH</u>	<u>KEY NO.</u>	<u>REMARKS</u>
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USA-57A

JULY

290530Z		14	Third rotor failed to step at counter reading 1642
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SEPTEMBER

080010Z	AFR	4d	Broke on EMRBD vice EMRPB
130520Z	BLY	4d	Broke on OBRER vice RBRER
190145Z	BWY	4c	Broke on DDXIZ vice DIXIZ
232140Z	CJH	4d	Broke on RUYEY vice RDVEY

6910TH SG

JULY

061248Z		11	Key tape contained 12 consecutive letters characters
131120Z	BJF	4d	Broke on LHVXO vice LHVXK
161015Z		2	Broke on PM rotor arrangement
301500Z	BZL	4d	Broke on MAFHY vice MAFNY

AUGUST

060345Z		12	Key tape stuck
080845Z	BOY	4c	Broke on BURRG vice VURRG
110820Z		2	Broke on PM rotor arrangement
250830Z		2	Broke on PM rotor arrangement
250921Z		2	Broke on PM rotor arrangement
251000Z		2	Broke on PM rotor arrangement
251005Z		2	Broke on PM rotor arrangement
251142Z		2	Broke on PM rotor arrangement
251145Z		2	Broke on PM rotor arrangement
251200Z		2	Broke on PM rotor arrangement
251200Z		2	Broke on PM rotor arrangement

6920TH SCTY GP

JULY

170200Z	DM?	4d	Broke on LNHLB vice LNULZ
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VIOLATIONS - (Cont'd)

<u>DTG</u>	<u>TRIGRAPH</u>	<u>KEY. NO.</u>	<u>REMARKS</u>
<u>6920TH SCTY GP (Cont'd)</u>			
<u>AUGUST</u>			
100030Z		5	Alignment derived using procedure for first message of cryptoperiod
181435Z		11	Keyboard operation
<u>SEPTEMBER</u>			
020400Z		11	Clear text tape
120705Z		11	Keyboard operation
110900Z		5	Alignment derived using procedure for first message of cryptoperiod
150607Z	FPA	4d	Broke on HYJAX vice HFGAK
171617Z		13	Message relayed to stations not authorized to receive COMINT information

SEO FEAF

JULY

060558Z 11 Clear text tape

SEPTEMBER

060115Z 11 Clear text tape

SSO USAFE

AUGUST

182100Z 11 Keyboard operation

6961ST SCTY GP

JULY

060040Z 11 Keyboard operation  
 120330Z 11 Keyboard operation  
 200130Z 11 Keyboard operation

AUGUST

062215Z 12 Rotors failed  
 081646Z 11 Keyboard operation  
 131950Z 11 Keyboard operation

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VIOLATIONS (Cont'd)

<u>DIG</u>	<u>TRIGRAPH</u>	<u>KEY NO.</u>	<u>REMARKS</u>
<u>6961ST SCTY GP (Cont'd)</u>			
<u>SEPTEMBER</u>			
010625Z		12	Key tape stuck
120315Z		11	Keyboard operation
102113Z		11	Keyboard operation
171040Z		11	Keyboard operation
252204Z		11	Keyboard operation

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KEY LIST OF AIR FORCE VIOLATIONS

July, Aug., & Sept., 1954

ROTOR ARRANGEMENT

1. Encipherment with one rotor reversed rather than straight, straight rather than reversed, or with one or more incorrect rotors. (Reference AFSAG 1262, para 5006a(1))
2. Use of a rotor arrangement for an inappropriate cryptoperiod, day or month. (Reference AFSAG 1262, para 5006a(1))
3. Use of a rotor arrangement from a key list assigned to another station. (Reference AFSAG 1262, para 5003b)

ROTOR ALIGNMENTS AND MESSAGE INDICATORS

4. Discrepancy between the message rotor alignment resulting from decipherment of the message indicator and message rotor alignment actually required to decipher the message, although the latter was correctly derived. The discrepancy involved (a) transposition of letters, (b) substitution of a letter alphabetically adjacent to the correct letter, (c) substitution of a phonetically similar letter, or (d) errors in encipherment.
5. Failure to tail previously enciphered message. (Reference AFSAG 1262, para 6002a(4))
6. Omission or addition of one or more letters to the message indicator.
7. The message rotor alignment was transmitted in the clear as the last five letters of the message indicator. (Reference AFSAG 1262, para 6002a(5))

KEY GROUP

8. The trigraphic key-group indicator in the message indicator did not correspond to the key group actually used for encipherment. Reuse of a key group was not involved. (Reference AFSAG 1262, para 5004b)

MACHINE DESIGNATOR AND MULTISWITCH SETTING

9. The machine designator in the message indicator did not correspond to the multiswitch setting used for encipherment. The messages were (a) correctly enciphered or (b) incorrectly enciphered. (Reference AFSAG 1262, para 6002a(1))

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10. Transmission of classified information in monoalphabetic substitution cipher.
  11. Revelation of COMINT information to unauthorized personnel.
  12. Transmission of a message in which there was faulty rotor stepping during encipherment. (Reference AFSAG 1262, para 6002a(3))
  13. Transmission of a message containing an incorrect date-time group.
  14. Reuse for encipherment of the same segment of key tape.