*Please find below a communication from the EXAMINER
in charge of this application.*

LS :ab

*John A. Marzall*

*Commissioner of Patents.*

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GPO    16—27815-9

Applicant:    **William F. Friedman**

Ser. No.      **107,244**
Filed         **October 23, 1936**
For           **CRYPTOGRAPHS**

Responsive to Appeal of November 26, 1951.

In reviewing this case for purposes of Examiner's
Answer it has been found that the principal reference
Damm , 1,540,107, has been misapplied to the finally
rejected claims, and that certain significant features
thereof have been overlooked in the allowance of claims.
In order to correct the above inadvertances the final
rejection of claims 15-17 along with the allowance of
claims 2-14 are hereby withdrawn and the following
action is issued.

In the Damm patent commutators $C_1$ $C_2$ corres-
pond to elements 16-20 of this case, cam units $N_1$ to
$N_4$ - to the cam devices 6-10, keys T+, $T_m$, etc. - to
keys 1, and keys $T_2+$ and $T_2m$ - to keys 2. Unit v5
of the reference is an additional encoding device over
and above the encoding instrumentalities disclosed by
the applicant; it is not needed for anticipation of
the claims and may be ignored (omitted with its func-
tion) along with some other features of the reference
not involved in the present case.

With the foregoing understanding of the
reference in mind, claims 2-5, 7, 9, 11, 13, 14 and
17, are rejected as fully met by Damm. In connection
with the recitations in claims 7 and 13 to the effect
that cams are rotated "at different angular velocities"
it should be noted that in the reference the ratchet
wheels associated with cams $N_1$ - $N_4$ are of different
diameters just the same as are applicant's ratchet
driving cams 66-70. Thus, it is perfectly obvious
that the recitation of "different angular velocities"
reads on the reference as well as it does on appli-
cant'd disclosure.

Claims 6, 8, 10 and 12 are rejected as sub-
stantially met by Damm. The reference shows cams $N_1$
to $N_4$ of varied sizes but fails to describe their
precise proportions, or their exact mathematical
relation. Thus it is not clear whether these cams
are "prime to one another" or not, but is held obvious
and non-inventive to make them such. The limitation
quoted is not deemed of patentable significance. The
comment as to the "prime" relation disposes also of
the "aperiodic" limitation of claim 10.

Claims 15 and 16 are rejected as not patentable
over Damm. The sole distinction from the reference
resides in the recitation of "a similar plurality of

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rotatable camming members"; this refers to the
presence of one cam such as 6 for each commutator
wheel such as 16. In the reference, two cams control
the stepping of each commutator wheel ($N_1$ and $N_2$ con-
trol stepping of $C_2$, for example) thereby attaining a
higher complexity of coding. It is obvious that if a
more simple code were sufficient one of these two cams
could be omitted without exercise of invention. In
this connection note applicant's own statement on page
7, lines 14-17 of his specification.

Claims 15-17 are further rejected as covering
nothing more than the functions of applicant's apparatus.
They are actually worded in terms of apparatus features
and do not properly point out whatever slight variation
or improvement the applicant may have achieved over
the prior art. Clearly his invention lies in a coding
machine, not in any novel method of coding. In re
Washburn, 640 O.G. 8; in re Ashbaugh 630, O.G. 622;
in re Kinderman 633 O.G. 632.

In the specification, page 8, lines 13-20,
some numbers of contact lines (shown in Figure 2)
are erroneous. Correction is in order.

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While it is recognized that the present
rejection constitutes a substantial deviation
from the earlier treatment of the case, it in-
volves no new art and may be taken as final if
desired (for purpose of appeal).

                                          Examiner