25X1

NSC BRIEFING 21 OCTOBER 1954

SOVIET GUIDED MISSILES

I. Complex: must distinguish between what known, what suspected, and what still trying find out.

A. First, know Soviets intensely interested in German WWII missiles -- took away 400 German experts, also missiles, labs, plants.

1. By 1950, Germans being returned -- now only 50 control specialists, still in USSR.

25X1

B. Second, know Soviets have missile test range (KAPUSTIN YAR, near Stalingrad). V-2's fired there in '47 and indications continuing use.

25X1

25X1

25X1

C. Also, know USSR capable (in terms science, technology, economy) supporting sizeable missiles program.

[redacted]

E. Consequence: US intelligence community convinced USSR has extensive guided missile program, US and allies face growing threat over next yeass (recent National Estimate).

[redacted]

F. However, don't know particulars -- kinds of Soviet missiles now on hand, or under development.

G. Thus, when mention specific missile, this not based firm current intelligence.

[redacted]

1. Instead, derived from estimate of Soviet military requirements, [redacted]

[redacted]

2. Eminent outside consultants participated in preparation this estimate and concur in its conclusions.

II. One major factor which makes Soviet program threat is growing Soviet nuclear capability.

A. Increasing size Soviet nuclear stockpile would lead USSR to accept limited missile reliability - 40-60%

B. Similarly, expected larger warhead yields would compensate for limited missile accuracy.

III. Another major factor leading USSR to develop offensive air-to-surface and surface-to-surface missile systems is improving allied air defense capability.

[redacted]

IV. Community's estimate gives types of missiles USSR expected develop, probable dates initial availability.

A. Very high priority is improvement Soviet air defense. Could now have, as "surface-to-air" weapon, improved type (thirteen-mile) "WASSERFALL". By '55, range will increase, and missile could have semi-active radar homing (somewhat below "NIKE" in performance).

B. Probably now have "air-to-air" rocket, infra-red guided, with 2-1/2-mile range. By '55, could have twice range (like "SIDEWINDER").

V. Among offensive missiles (also major Soviet goal), USSR will push for following:

A. "Surface-to-surface" pilotless aircraft for submarine-launched attack on coastal areas. For past few years could have had improved "V-1" (200-mile range). By '55, could have (500-mile range) subsonic "pilotless aircraft".

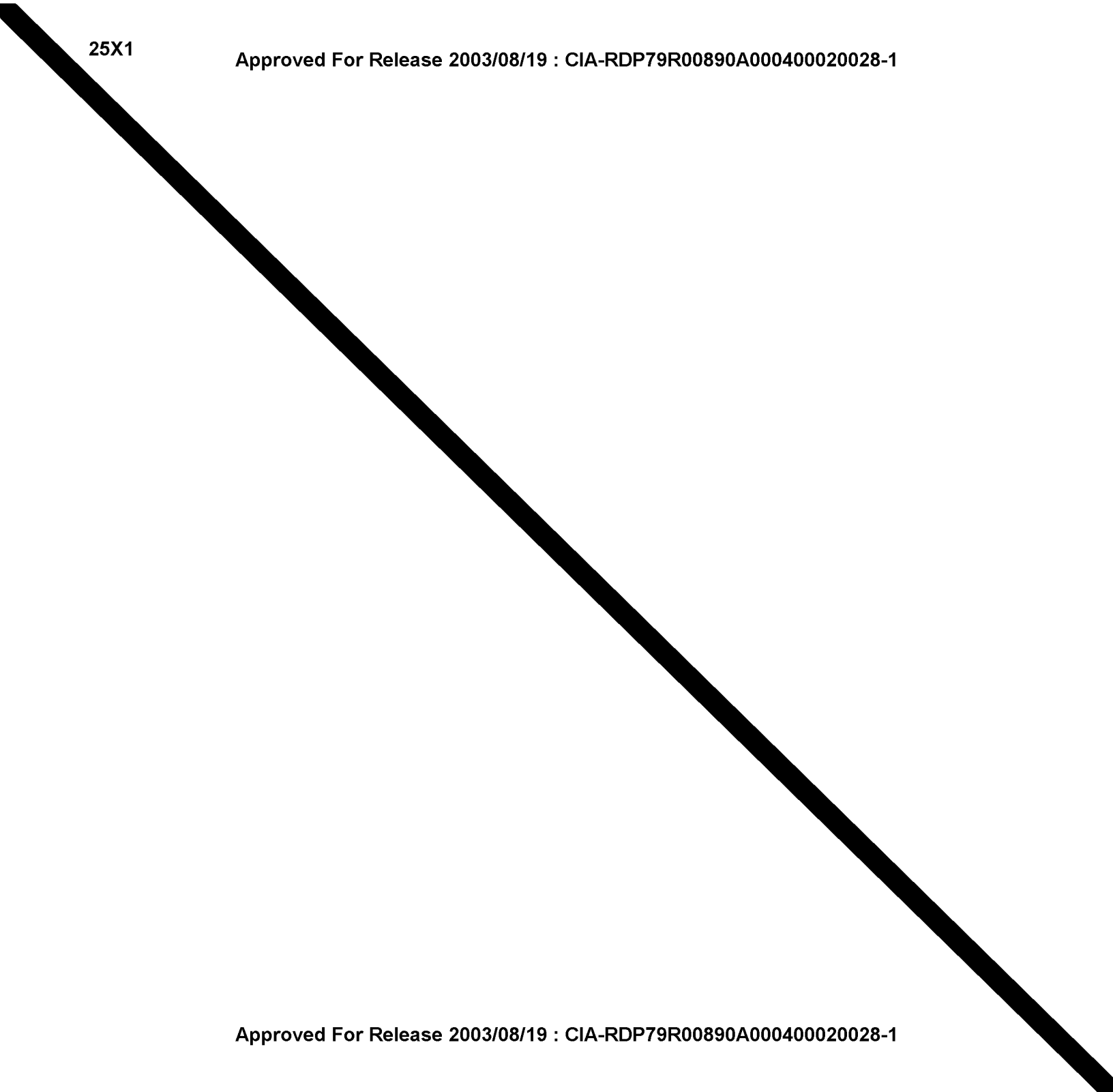
B. In "ballistic" missile field, will probably develop "family" of short and medium range "surface-to-surface" types. Could probably now produce either short-range "native design" or improved (350-mile range) "V-2", as counter to allied tactical nuclear capabilities in Europe. However, we estimate that more advanced types ballistic missiles will not be put into quantity production unless and until allied air defense improvements make piloted bombers impractical means nuclear attack. In interim, development work on "ballistic" family will assist evolution of inter-continental missile.

C. Ultimate missile threat is inter-continental ballistic missile (IBM). Believe USSR will make concerted effort produce IBM, as counter to expected similar US weapon and as potentially decisive means attack. Such weapon, with 3,000 pound thermonuclear warhead and range of 5,500 miles, could enter production by 1963, Or -

1. If no major delays and all-out effort, possibly as early as 1960.

D. By 1963, warhead could have a yield of [redacted] *

1. Advent of IBM means entirely new type of threat to US. Attacks on launching sites are only countermeasures now known or in prospect.



Approved For Release 2003/08/19 : CIA-RDP79R00890A000400020028-1