# The combination of COM701 + BMS-986207 + nivolumab demonstrates preliminary anti-tumor activity in patients with recurrent, metastatic MSS endometrial cancer. NCT04570839.

## Ryan J. Sullivan,<sup>7</sup> Stephanie Gaillard,<sup>8</sup> Adeboye H. Adewoye,<sup>9</sup> Inbal Barbiro,<sup>10</sup> Pierre Ferre,<sup>10</sup> John William Moroney<sup>11</sup>

<sup>1</sup>The START Center for Cancer Care, San Antonio, TX; <sup>2</sup>West Cancer Center, Houston, TX; <sup>3</sup>University of Texas MD Anderson Cancer Center, Houston, TX; <sup>4</sup>Department of Investigational Cancer Therapeutics, The University of Texas MD Anderson Cancer Center, Houston, TX; <sup>4</sup>Department of Investigational Cancer Center, Houston, TX; <sup>4</sup>Dep <sup>5</sup>Department of Gynecologic Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, START Midwest, Grand Rapids, MI; <sup>7</sup>Medical Oncology, Massachusetts General Hospital, Boston, MA; <sup>6</sup>Clinical Research, Boston, Bosto Comprehensive Cancer Center, Baltimore, MD; <sup>9</sup>Clinical Development., Compugen Ltd., Holon, Israel; <sup>11</sup>Department of Gynecologic Oncology, University of Chicago, Chicago, IL

### BACKGROUND

- COM701 is a novel 1st in-class immune checkpoint inhibitor [ICI] that binds to poliovirus recepto related immunoglobulin domain containing [PVRIG] leading to enhanced activation of T and NK-cells
- BMS-986207 is an ICI and anti-TIGIT antibody
- Nivolumab is an ICI that has been well described
- We have previously reported that the triplet [COM701 + BMS-986207 + nivolumab] is very well tolerated, has a favorable safety profile and demonstrates preliminary anti-tumor activity<sup>1,2</sup>
- There is a high unmet medical need for the treatment of patients with microsatellite stable [MSS], recurrent, metastatic, endometrial cancer.
- We hypothesized that in patients with MSS-endometrial cancer blocking the DNAM-1 axis with a triplet combination consisting of COM701, nivolumab and BMS-986207 will have an acceptable safety/tolerability profile and also demonstrate anti-tumor activity
- We present preliminary results on safety, tolerability, translational pharmacodynamic readouts and anti-tumor activity

#### **DNAM-1 Axis Pathway**

Blocking PVRIG may be the missing piece when current checkpoint inhibitors fail



- Two parallel and complementary inhibitory pathways (PVRIG & TIGIT) discovered by Compugen's computational discovery platform
- Potential synergy between PVRIG/TIGIT and PD-1 pathway



### **STUDY DESIGN**

• CT imaging Q2 cycles – All pts

• Study treatment for 2yrs unless PD, toxicity, withdrawal of consent, PI discretion – all pts In this study we report on 9 patients [red boxes above]:

• Combination dose expansion - in addition to COM701; all patients received BMS-986207 + nivolumab both 480mg all study treatment IV Q4W

### METHODS

- As part of an expansion cohort, we enrolled 9 patients with MSS, recurrent, metastatic endometrial cancer
- All pts received COM701 20 mg/kg + BMS-986207 480 mg + nivolumab 480 mg. All IV Q4W
- Anti-tumor activity (per investigator) was evaluated per RECIST v1.1 with CT imaging every 8 weeks starting from the first dose during the first 6 cycles of the study and every 16 weeks thereafter (or at any time point progressive disease is suspected)
- Safety per CTCAE v5.0
- Study treatment for 2yrs unless PD, toxicity, withdrawal of consent, PI discretion

### **KEY ELIGIBILITY CRITERIA AND STUDY OBJECTIVES** [MSS-EC COHORT]

*Key Inclusion Criteria:* • Age  $\geq$  18 yrs

- Histologically confirmed endometrial cancer
- Prior PD-1/PD-L1 permissible
- Measurable disease

#### *Key Exclusion Criteria:*

- discontinuation
- Prior receipt of anti-PVRIG antibody
- Prior receipt of Anti-TIGIT antibody

#### Key Primary Objective:

Secondary Objectives:

Immunogenicity of the triplet

• Anti-tumor activity of the triplet

Exploratory Objective:

### DEMOGRAPHICS

Sex, Female Age [yr], ≥65 ECOG [0, 1]

Race [white]

Median prior lines of Prior cytotoxic therap Prior anti-PD1/PD-L1

Data cut date 04/10/2023

### **PATIENT DISPOSITION SUMMARY**

#### Parameter

Number of patients Discontinued study t Reasons for study tre PD per RECIST v1.1 PD [clinical evaluat Withdrew consen Adverse event Death [due to prog Data cut date 04/10/2023

#### **SUMMARY OF INVESTIGATOR-ASSESSED RESPONSE [RECIST V1.1]**

Parameter	COM701 + BMS-986207 + nivolumab n=9 [%]
ORR [CR+PR]	2 [22] [95% CI: 3, 60]
Disease control rate [CR+PR+SD]	4 [44] [95% CI: 14, 79]
Best response	
CR	-
PR [confirmed]	2 [22]
SD	2 [22]
PD	5 [56]
Patient 003 with confirmed PR, delayed data entry. Data cut date 04/10/2023.	

#### REFERENCES

**1.** Dumbrava E E, et al., SITC 2021 **2.** Moroney J, et al., ESMO-IO 2022 **3.** Yeku O, et al., ESMO-IO 2022 **4.** Sullivan R, et al., ESMO-IO, 2022 **5.** Overman M J, et al., SITC 2022 **6.** Vaena D A, et al., ASCO 2021 7. Sullivan R, et al., AACR, 2020

ACKNOWLEDGMENTS We thank the patients for participating in this clinical trial and their families, the investigators and their staff at the clinical trial sites. Study Sponsor – Compugen Ltd in collaboration with Bristol-Myers Squibb.

Drew W. Rasco,<sup>1</sup> Daniel A. Vaena,<sup>2</sup> Gini F. Fleming,<sup>3</sup> Ecaterina Elena Dumbrava,<sup>4</sup> Oladapo O. Yeku,<sup>5</sup> Manish Sharma,<sup>6</sup> Kyriakos P. Papadopoulos,<sup>1</sup>

 Documented MSS status by an FDA approved test e.g. genomic testing or IHC • Disease progression with ≤2 prior systemic cytotoxic therapies

• Active autoimmune disease requiring systemic treatment • History of immune-related toxicities on prior immunotherapy treatment leading to

• Safety and tolerability of profile of the triplet combination

Pharmacodynamic activity of the triplet

	COM701 + BMS-986207 + nivolumab N=9 [%]		
	9 [100]		
	6 [67]		
	3 [33]		
	8 [89]		
therapy [range]	2 [1, 3]		
ру	9 [100]		
	3 [33]		

	COM701 + BMS-986207 + nivolumab N=9 (%)
reated	9 [100]
reatment	9 [100]
atment discontinuation	
	5 [56]
on]	1 [11]
	1 [11]
	1 [11]
ressive disease]	1 [11]

#### **PATIENT INCIDENCE OF TREATMENT-RELATED ADVERSE EVENTS – ALL PATIENTS**

Preferred Term (PT)	Grade 1/2 n [%]	Grade 3 n [%]	Grade 4/5 n [%]	All Grades n [%]
Any TRAE	5 [56]	2 [22]		7 [78]
Arthritis	1 [11]	-	-	1 [11]
Backpain	1 [11]	-	-	1 [11]
Chills	1 [11]	-	-	1 [11]
Headache	1 [11]	-	-	1 [11]
Lipase increased	1 [11]	-	-	1 [11]
Myalgia	1 [11]	-	-	1 [11]
Pneumonitis	-	1 [11]	-	1 [11]
Pruritus	1 [11]	-	-	1 [11]
Pyrexia	1 [11]	-	-	1 [11]
Small intestinal obstruction	-	1 [11]	-	1 [11]

Data cut date 04/10/2023.

#### PATIENT INCIDENCE OF SERIOUS TRAE -**ALL PATIENTS**

Preferred Term (PT)	Grade 1/2 n [%]	Grade 3 n [%]	Grade 4/5 n [%]	All Grades n [%]
Any serious TRAE	-	2 [22]		2 [22]
Pneumonitis	-	1 [11]	-	1 [11]
Small intestinal obstruction	-	1 [11]	-	1 [11]
Data cut date 04/10/2023.				

#### **SWIMMER PLOT**



Number of Days from Treatment Cycle 1 Day 1

Patient 003 had additional imaging assessments for confirmation of PR prior to data cut date. However delayed data entry at data cut date. All patients received COM701 20 mg/kg + BMS-986207 480 mg + nivolumab 480 mg. All IV Q4W. EXP: combination expansion \*Discontinued study treatment due to AE [pneumonitis]. PR maintained at time of AE. Patient off study treatment, but ongoing study imaging assessments. <sup>+</sup>Death [due to progressive disease] <sup>‡</sup>PD [RECIST v1.1] <sup>§</sup>Consent Withdrawn <sup>¶</sup>PD [clinical evaluation]

#### WATERFALL PLOT



#### **SPIDER PLOT**



#### **TRANSLATIONAL PHARMACODYNAMIC** READOUTS

- Translational assessment of peripheral blood, including profiling of cytokines and circulating immune cells, clearly showed a positive pharmacodynamic activation of the immune system following PD1/TIGIT/PVRIG blockade, which correlates with days of treatment and clinical benefit (CB), ie PR and SD>100 days.
- (A) Increased proliferation of CD8 T cells, as reflected by increase in Ki67, 8 days post first treatment (C1D8), both by raw values and percent of change compared to baseline, among patients with clinical benefit compared to patients with progressive disease as best response, which also positively correlates to days of treatment.
- (B) Overall increase in serum IFNy (C1D2, C1D8) compared to baseline, which trends to be higher among patients with clinical benefit.
- (C) Serum IL-6 reduction at D28 post first treatment (C2D1), among patients with clinical benefit compared to patients with progressive disease.



C1D1 C1D2 C1D8 C1D15 C2D1 C2D8 C3D1 C4D1

Data cut date 04/10/2023.

C1D1 C1D2 C1D8 C1D15 C2D1 C2D8 C3D1 C4D1



### Abstract Number 5595

#### **CLINICAL VIGNETTE - PATIENT 006 WITH CONFIRMED PARTIAL RESPONSE**

71yr old female, ECOG 0 with stage III endometrial cancer [histology - endometrial carcinosarcoma] initially diagnosed 2020, diagnosed stage IV 2022. MSS by IHC ceived 2 prior lines: adjuvant carboplatin/paclitaxel [2020]. 1st line metastatic [2021]

#### **Pre-treatment Imaging Assessment**



1st Post-treatment Imaging Assessment



B: 10.0 mm; A: 11.3 mm



B: 25.9 mm; A: 51 mm



B: 28 mm; A: 6.7 mm

#### CONCLUSIONS

- The triplet combination of COM701 with nivolumab and BMS-986207 is well tolerated and has a favorable safety and toxicity profile with no new safety signal
- The triplet combination demonstrates encouraging preliminary signal of anti-tumor activity in pts with microsatellite stable recurrent, metastatic endometrial cancer
- Confirmed partial responses in 2/9 [ORR 22%] patients
- Disease control rate 4/9 [44%] patients
- Patients with clinical benefit (PR+SD>100 days) had early pharmacodynamic activation as shown by peripheral IFNy and CD8 T cell proliferation increase at first cycle and IL-6 decrease at cycle **2** compared to patients with progressive disease
- Confirmed partial response reported with the triplet combination in a patient with endometrial carcinosarcoma and prior treatment refractory disease to standard of care treatment with lenvatinib + pembrolizumab On study treatment with the triplet combination for 203 days
- The data adds to prior disclosures on anti-tumor activity in multiple tumor types [anal SCC, NSCLC, MSS-CRC with liver metastases, OVCA] of COM701 in combination with nivolumab +/- BMS-986207 in patients with prior treatment refractory disease or PD after prior exposure to ICI<sup>2-7</sup>
- This data supports Compugen's DNAM-1 axis hypothesis and strengthens the need for further development as cancer immunotherapy

#### Best Overall Response ← PD ← SD ← PR

Patient 001

Data cut date 04/10/2023 180 210

All patients received COM701 20 mg/kg + BMS-986207 480 mg + nivolumab 480 mg. All IV Q4W. C EXP: combination expansion.